The Mining Journal
AND ATMOSPHERIC RAILWAY GAZETTE,

FORMING A COMPLETE RECORD OF THE PROCEEDINGS OF ALL PUBLIC COMPANIES.

No. 588.—Vol. XVI.] LONDON: SATURDAY, NOVEMBER 28, 1846. [Price 6d.

SIXTY-FOUR SHARES IN ONE OF THE FIRST SILVER-LEAD MINES in the county of CARDIGAN, and SHARES in other valuable BRITISH MINES.

MR. C. WARTON is directed to submit to PEREMPTORY SALE, BY AUCTION, under peculiar circumstances, in one or more lots, at the Auction Mart, opposite the Bank of England, on Wednesday, the 16th of Dec. next, at Twelve o'clock (unless an acceptable offer for the whole be previously made), SIXTY-FOUR SHARES, or 1-20th part, of the valuable SILVER-LEAD MINES, known as LLANCYNFELIN MINES—conducted on the Cost-book System: £6 per share have been paid, and the operations already effected give promise of splendid results to the shareholders. See *Mining Journal*, 18th April and 17th June last. Since which reports, the most satisfactory progress is making.—At the same time, will BE SOLD, SHARES in Botallack, Treleigh Consols, Tamar, Dolcoath, East Wheal Crofty, and other mines.

Particulars, in due time, may be had at the Mart; at the Golden Lion, Liverpool; at Pearce's Hotels, Truro and Penzance; and of Mr. C. Warton, auctioneer and estate agent, No. 38, Threadneedle-street, London.

VALUABLE AND EXTENSIVE FOUNDRY & ENGINE WORK, at ALLOA, FOR SALE, for behoof of a sequestrated estate.—TO BE SOLD, BY PUBLIC AUCTION, within the Waterloo Hotel, Edinburgh, on Tuesday, the 8th day of December, at Two o'clock, in the Afternoon, at the GREATLY REDUCED upset price of 5000*l.*, and WITH IMMEDIATE ENTRY,

THE ALLOA FOUNDRY AND STEAM-ENGINE MANUFACTORY, WITH HARBOUR ATTACHED,

Containing most ample accommodation, and every facility for carrying on the business of IRONFOUNDING, LOCOMOTIVE and STEAM-ENGINE MAKING, and IRON STEAM-BOAT BUILDING, on an extensive scale.

The Premises cover nearly Two Acres of Ground; the Buildings are most substantial, having been constructed within a few years entirely of stone. They are particularly well situated for supplies of PIG-IRON and COAL—three large Iron-Works being within a short distance, and coal in the immediate vicinity of the works. The produce of the Manufactory can be shipped from the Harbour belonging to it, free of any dues, and the Stirling and Dunfermline Railway will pass near the Works, and form a connection with all the great lines of railway in the kingdom. The MACHINERY, UTENSILS, and PATTERNS (the latter being extensive and useful), are all of the best description, and in excellent order.

A detailed description of the Works (which are in operation), appeared in the *Mining Journal*, 17th Oct.; and, for further information, application may be made to Mr. Brydie, banker, Alloa; Messrs. Lockhart, Hunter, and Whitehead, W.S., 84, Great King-street, Edinburgh (who are in possession of the titles, and inventory of the machinery, utensils, &c.); or to Mr. Muir, 17, Quality-street, Leith, trustee on the Estate.

Particulars may be had at the office of the *Mining Journal*, 26, Fleet-street, London.

Leith, Nov. 19, 1846.

ADJOURNED SALE.—UPSET PRICE REDUCED.

EXTENSIVE AND VALUABLE IRON-WORKS, IN CLOSE VICINITY OF THE HARBOUR OF ABERDEEN.

There will be again exposed FOR SALE, BY PUBLIC ROUP, within the Lemon Tree Tavern, Aberdeen, on Saturday, the 19th day of December next, at Six o'clock, P.M., those extensive and valuable PREMISES, at FOOTDEE, ABERDEEN (bounded on the west by the harbour), known as

"THE DEE IRON-WORKS,"

and long employed in the ENGINEERING and MILLWRIGHT BUSINESS, and in IRON-FOUNDING, BOILER-MAKING, IRON SHIPBUILDING, BLACKSMITH WORK, BRASS FOUNDING, &c. &c.

These works are very compact, and much more advantageously situated than many other works of the same description, for iron shipbuilding and engineering business—having a WATER FRONTAGE to the HARBOUR, and in close connection with the other parts of the establishment—and the whole lying so contiguous, that all the branches of the business can be carried on under the same superintendence.

In the BUILDING YARD several iron vessels may be proceeding at one and the same time, of from 200 to 2000 tons burthen; and the tools and machinery in this department are believed to be equal to any in the kingdom; there are other accommodations for carrying on this branch of business in its fullest perfection.

In the ENGINEERING DEPARTMENT the tools and machinery are of the most improved principle, and capable of constructing engines or machinery equal in magnitude to any known at the present day, and are sufficient to employ (constantly) from 100 to 150 men. In connection with this department, the building and fitting of locomotives may be carried on to the greatest extent.

The IRON FOUNDING DEPARTMENT is fitted up in the most complete manner, and capable of turning out both heavy and light castings, and of fully employing 60 men.

In the BOILER-MAKING DEPARTMENT, which is separate from the iron shipbuilding premises, there is a complete set of tools and machinery, of the best description, capable of employing 150 men.

In the BLACKSMITH SHOP there are 12 forges, all blown by fan-blast, with cranes attached to the principal ones, and each forge having a complete assortment of tools, for engineering, millwright, and shipbuilding purposes.

The MILLWRIGHT and PATTERN-MAKERS' DEPARTMENT has a full assortment of all kinds of joiner and millwright's tools and fixtures, for the employment of 25 men, with a large stock of the most modern and useful patterns, which will be given over with the works.

There are also the necessary machinery and tools for carrying on the BRASS-FOUNDING and FINISHING BUSINESS, and PLUMBER and COPPERSMITH WORK, to a large extent.

The whole establishment, if fully employed, is capable of turning out work to the amount of £60,000 or £70,000 a-year; and having been for several years, and still being, in full operation, the purchaser will have the advantage of commencing business immediately.

The greatest facilities of communication are afforded, by regular trading steam and other vessels, from Aberdeen to London, Hull, Newcastle, and Leith, in the south; and Inverness, Wick, Orkney, and Shetland, in the north.

The extensive improvements on the harbour, now going on, and the projected railway schemes in connection with Aberdeen, afford every prospect of full employment for a work of this description, for a long period to come.

If the purchaser were desirous of removing the plant elsewhere, the cost of transmission would be comparatively small; and the buildings are so constructed as to be convertible into other manufacturing purposes, at little expense, as there are three fixed steam-engines on the premises.

The price of the works, and other particulars, will be arranged so as to suit the convenience of the purchaser.

For further information, apply to Mr. J. Hunter, W.S., 13, Hill-street, Edinburgh; Wm. Robison, advocate, 58, Castle-street, Aberdeen; or to Mr. Vernon, at the works, who will show the premises, and, on application, forward a plan of the buildings, and inventory of the machinery, tools, &c.—Aberdeen, Nov. 10, 1846.

FORTY-INCH STEAM-ENGINE FOR SALE.—An excellent CORNISH CONDENSING ENGINE TO BE SOLD, BY PRIVATE CONTRACT, cylinder 40 inches diameter, in a steam case; stroke 9 feet in the cylinder, and 8 feet in the shaft. This engine now stands at the Frougoch Mine, near Aberystwith, and may be viewed by application to the agents on the mine. It will be sold with or without two cylindrical boilers, which are attached to it, and will be delivered by the owners on the Quay at Aberystwith. The engine is perfectly complete, and in good condition—it has never done much work. The price of the engine, including the first piece of rod, the steam and feed pipes, and all boiler connections, is £650, delivered at Aberystwith.

The boilers, with the engine, or separately, is £12 per ton on the Quay at Aberystwith.

Also, a PLUNGER LIFT, of 18 fathoms in length, applicable to a water-works or shallow colliery. The plunger pole is 22 inches diameter, and the column of 24 inches bore. The price of this lift, complete, is £8 10s. per ton for the cast-iron parts, delivered in Aberystwith, and 3d. per lb. for all the bolts, rings, &c., delivered.

Applications to be made to John Taylor, jun., Esq., 9, Duke-street, Adelphi, London; or to George Fossett, Esq., Aberystwith.

Lisburne Mines, Nov. 27, 1846.

FOR SALE, BY PRIVATE CONTRACT, at WHEAL PERRAN, now forming a part of the Perran St. George United Mines, a SINGLE ACTING ROTATORY STEAM-ENGINE, without boiler, which was erected quite new on that mine, and was in use only a short time; cylinder 20 inches diameter, 8 feet stroke, equal beam, with large fly-wheel, cranks, shafts, and sweeprod, complete. This engine is very compact, and well made—works on the expansive principle, and may be applied for pumping only—and for which purpose it may be had without fly-wheel, &c. There is also an excellent CRUSHING MACHINE, or GRINDER, attached to it, which may be had cheap.

Application to be made to Capt. Thomas Pill, at Perran St. George United Mines; or to Mr. James Sims, engineer, Redruth.

MINES TO LET.—TO BE LET, BY ROYALTY, the COAL and IRONSTONE MINES, under upwards of 100 acres of land, at SWINDON, near HIMLEY.—The Staffordshire and Worcestershire Canal passes through the estate.—For particulars apply to Mr. William Fellows, solicitor, Dudley.

GLENKENS LEAD AND COPPER MINES, KIRKCUDBRIGHTSHIRE.—In consequence of MINERALS, of considerable value, having been found on the ESTATES in which the GLENKENS MINES are situate, an Act of Parliament has been obtained, to enable the trustees to GRANT MINERAL LEASES. These mines are situated in the centre of a mineral country, and in the vicinity of the flourishing lead works of Carsphairn, Lead Hills, the Newton Stewart, and Heston Island Copper Mines, the Kirkcudbrightshire Mining Company's works, and others in that part of Scotland.

The proprietor has been, for the last two years, exploring and opening the ground; and five promising lodes have been proved, which are now being opened and extended by Cornish miners. There being every prospect of a most satisfactory result at an early period, as appears from the reports of the several mine agents who have inspected the lands, as also of the captain now superintending the works, a company is being formed, to give the mines a fair trial, on the principle of the Cost-book System, by dividing the interests into 1000 shares, of which some few still remain unappropriated.

Plans of the sett, comprising about 1200 acres, and the several reports, may be seen, and every information obtained, at the offices of Messrs. Bullock and Luscombe, No. 35, Lincoln's Inn-fields, to whom applications for shares must be made.

AGENCY IN DUBLIN—WANTED, by a GENTLEMAN, having an extensive Irish connection, and 16 years' experience in general business, embracing Ironmongery, Stationery, Wine Trade, &c.—at present Agent in Ireland for a Spanish house, and visiting the chief provincial towns. Advertiser would treat with a British house, or company, desirous of an AGENT, for SALE of PATENT INVENTIONS, PIG and BAR-IRON, STEEL, CASTINGS, IRONMONGERY, STATIONERY, CHEMICALS, &c. Respectable references given. Please address "Irish Agent," 6, College-green, Dublin.

TO COALOWNERS—those possessing COLLIERIES, or FIELDS, of CANNEL, PARROT, or other similar highly BITUMINOUS qualities of COAL.—WANTED, in London, a SUPPLY of this DESCRIPTION of COAL, for the purpose of manufacturing gas. The coal in question abounds in Lancashire, Yorkshire, Northumberland, Durham, and some other counties in England, in Scotland, and in parts of South Wales, and is found to be superior for gas purposes, particularly in the illuminating power of its gas. Any proprietors possessing such coal, and can deliver it in London, either by sea, canal, or railway, will be pleased to communicate with Joseph Hedley, Esq., General Consulting Gas Engineer, 29, Bucklersbury, London—stating quantity that can be delivered annually, present price per ton delivered at a wharf or railway station in London, quality, so far as known, and other particulars.

SULPHATE OF BARYTES.—WANTED, STONE of GOOD QUALITY.—Address "A. G. S.," Saddle Inn, Liverpool, stating quantity and price, delivered at Liverpool or Runcorn.

TO CAPITALISTS.—The ADVERTISER is in possession of an IMPROVEMENT of an ARTICLE of GREAT CONSUMPTION in all MINES, QUARRIES, EXCAVATIONS, &c., and will COMMUNICATE PARTICULARS to any honourable gentleman, or company, that may be disposed to carry on the MANUFACTURE of the ARTICLE. From £700 to £800 will be quite sufficient to secure patent and carry on the whole business. The new article will entirely supersede the article now in use.—Address (post-paid) to "S.F.," care of Mr. Joseph Sims, engineer, &c., Tavistock

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VENTONGIMPS MINING COMPANY.

(FORMED ON THE COST-BOOK SYSTEM.)

The shareholders in the late Cornubian Mining Company, and others disposed to join in the prosecution of the works at the above sett, are informed that the whole of the surface works are now completed, including the erection of a powerful engine and all necessary buildings, and that, on application as below, they may receive shares on equal terms with the original projectors; and, as the number of shares to be disposed of are but limited, early applications are recommended. The sett is divided into 1000 shares, and the total cost and outlay, to ensure results, has been estimated not to exceed £5 per share.

Office, No. 4, Austinfriars. J. J. ISELIN, Hon. Sec.

VICTORIA TIN MINING COMPANY.

(Late the Wheal Fortune Consols and other Setts.)

ON THE COST-BOOK SYSTEM.

Capital 10,240 shares, of £2 each.—Deposit £1 per share.

DIRECTORS.

JOHN HOLMES, Esq., *Chairman.* | HENRY J. PRESTON, Esq.
Capt. HAMILTON, J.P. | W. HOLMES, Esq.
SAMUEL HOLDSWORTH, Esq. | WILLIAM GARROW, Esq.

LOCAL MANAGERS.

Capt. JAMES CHYNOWETH. | Mr. THOMAS JULIAN.

BANKERS—Commercial Bank of London, Lothbury, and Henrietta-street, Covent-garden. Sir Claude Scott, Bart., and Co., Cavendish-square.

SECRETARY—Lieut. W. H. Smith, R.N.

Notice is hereby given, that the directors have completed the allotment of the shares of this company, and ISSUED the LETTERS of ALLOTMENT. By order,

1, Copthall Chambers, London, Nov. 16, 1846. W. H. SMITH, Secretary.

WHEAL BARBARA SILVER-LEAD AND COPPER MINE, two miles from the port of WADEBRIDGE, CORNWALL.

Capital £12,800, in 2560 shares, of £5 each.—Deposit 30s. per share.

REGISTERED PURSUANT TO ACT.

This mine is in a district long known as productive of silver-lead and other ores; on the east the Treburget Mine has produced immense quantities. The proprietors have driven an adit about 50 fathoms, and sunk a shaft on a large lode, highly productive, depth considered, of silver-lead and copper ores; an assay, by Mr. Richard Rodda, of St. Austell, gave 44 oz. 12 dwts. to the ton of lead, and other lodes are known to exist within the sett.

The proprietors retain one-half of the shares, free of deposit, but subject to calls, as consideration for the property and cost up to August last—the remaining 1280 shares pay the deposit of 30s. each, to provide the engine, and to carry on the works, which the proprietors confidently expect will shortly become profitable.

About one-half of the 1280 shares are yet to be appropriated, for which application may be made to the directors, at the company's office, 8, Gresham-street, London, where reports, prospectuses, maps, specimens, leases, &c., may be seen.

8, Gresham-street, London, Nov. 12, 1846.

WHEAL CURTIS COPPER MINING COMPANY, in the PARISH OF CROWAN, NEAR CAMBORNE, CORNWALL.

In 6000 shares, of £4 each.—Deposit £1 10s. per share.

PROVISIONAL DIRECTORS.

GEORGE PILKINGTON, Esq., C.E., late Captain Royal Engineers.
GEORGE EVANS, Esq., C.E.
MARTIN STAPLEY, Esq., Homerton.

(Other directors will be shortly published.)

BANKERS—Messrs. Cunliffes, Brooks, Cunliffe, and Co.

SOLICITOR—Henry Bull, Esq.

SECRETARY—E. Mills, Esq.

This mine is in its infancy, the shaft being now only at the depth of 47 fathoms below the adit; nevertheless, it has already produced upwards of £10,000 by its copper ore, one-half of which sum the late Mr. Thomas Teague, of Redruth, the celebrated mining captain, who worked this mine at his own individual cost, appears to have expended in carrying on the works, so that by reason of his decease the mine left in the hands of the executors was abandoned at the very point to which his hopes of wealth had been directed, and at a time when she was (according to Mr. Nicholas Vivian's and Joseph Vivian's report, as printed in prospectus) very productive. They also say, "it is our decided opinion that a valuable and profitable mine will be found if prosecuted to deeper levels." These gentlemen (the Vivians) are so well-known that their opinions are relied on by those accustomed to mining operations.

To follow up the foregoing opinions, it is necessary to fork the mine, and to sink a new shaft to the westward of the present one, directly over a rich bed of ore mentioned in the report of Capt. Richard Rowe and Mr. Henry Thomas, F.G.S., as in prospectus, and to open new and deeper levels, as well as to work effectually those already made, which Capt. Teague's decease prevented him accomplishing, and to carry on which works a powerful 70-inch engine has been required; therefore a company has been provisionally formed to carry out these objects, for which purpose it has been determined to distribute the interest of this mine into 6000 shares of £4 each.

A deposit of 30s. is required to be paid on each share, and it is expected that no further portion of the £4 will be necessary.

Of the 6000 shares referred to, 3000 have been taken and paid on by the promoter of this company, who has thus given the best possible proof of his opinion of the prospect of valuable remuneration to adventurers; and of the other 3000 shares 1000 only remain to be allotted, since the issue of the first prospectus.

No call shall exceed the sum of 5s. per share. No responsibility will attach to any shareholder beyond the deposits paid, and the calls to be made on the shares: this to be secured by registered deed of settlement, as well as law and equity can devise.

There are six lodes in this sett, each considered equal in value to that of the neighbouring mine, called the Wheal Abraham, which yielded £300,000. Therefore £1,800,000 may be taken from this mine by well-directed energy.

It is a well-known fact that shares in mines recently opened under inferior prospects to those which Wheal Curtis presents, were purchased at as low a price as those now offered to the public, and have since realised £300 and upwards per share; and such is the confidence of the committee in the capabilities of this mine that they have taken upon themselves to purchase at auction the splendid 70-inch engine of the Hallenbesgle Mine, its boilers, pumps, and other materials, by which £1000 at least have been saved to the company. They are also pushing forward the proposed works with vigour, the progress of which since the first prospectus is stated in the second one.

Applications, with respectable reference, for the small proportion of shares remaining, as above stated, will not be received after the 1st December next. All letters for shares to be addressed to the offices, Gresham Rooms, Basinghall-street, to

E. MILLS, Secretary, pro tem.

UNITED STATES MINES.

COPPER ORE, from the best localities, as Grey, Black Oxide, and Sulpharet.
COBALT OXIDE, yielding from 5 to 30 per cent.
CHROME, yielding from 30 to 47 per cent.
MANGANESE, yielding from 75 to 90 per cent.
LEAD ORE, of the best quality.
ZINC, in form of Blende and Calamine.
Likewise, SOAP STONE, WHITE VITREOUS FELSPAR, BLACK LEAD, PURE WHITE LEAD, MICA, in small and large sheets.

THE ABOVE NATURAL PRODUCTIONS may be obtained in any quantity, and on the most reasonable terms, by applying to Dr. Lewis Tenchtwanger, New York City.

NOTICE TO THE MANAGERS OF MINING COMPANIES, SMELTING WORKS, &c.

Mr. MITCHELL (late Mitchell and Field) begs to announce, that ASSAYS and ANALYSES of all descriptions of ORES, MINERALS, and FURNACE PRODUCTS, are conducted at his LABORATORY, 28, HAWLEY-ROAD, KENTISH TOWN, to which direction all communications are to be addressed.

N.B.—Instruction in all branches of assaying and mineral analysis as usual.

TO MINE AGENTS.—WANTED, at BOSCASWELL DOWNS MINE, in the parish of St. Just, in Penwith, an active and intelligent AGENT, who is thoroughly competent to take the MANAGEMENT of a large TIN MINE. No one need apply who cannot produce satisfactory testimonials as to character and abilities.—Application to be made, on or before the 15th Dec., to Capt. Treweeke, Halestown, St. Ives.—Dated Boscaswell Downs Mine, Nov. 23, 1846.

GREAT WHEAL ROUGH OR CONSOLS.—MINING CAPTAIN WANTED.—He will be required to produce testimonials of his ability to conduct this concern with economy and judgment; he must have a thorough knowledge of underground operations in their various departments, as well as of the arrangement and application of machinery. None need apply except first-class agents, of great experience. Salary £10 per month.—Application to be made by letter, addressed to W. A. Thomas, Esq., of 50, Threadneedle-street, London, under cover, to Mr. Josiah H. Hitchins, Tavistock, Devon.—N.B. A STEAM-ENGINE WANTED, of from 40 to 60-inch cylinder.—Nov. 19, 1846.

SOUTH WHEAL BASSET ONE (128th) SHARE in this promising MINE FOR SALE.—Letters, stating the highest price which will be given, to be addressed to "X. X.," 13, Moorgate-street; and, if accepted, an answer will be immediately returned.

VALUABLE MINE SHARES FOR SALE.—FOR SALE, BY PRIVATE CONTRACT, THREE (18ths) PARTS, or SHARES, of and in all that valuable COPPER MINE, called WHEAL CLIFFORD, situate in the parish of Gwennap, in the county of Cornwall, adjoining the United Mines on the west, the Consolidated Mines on the north, and Wheal Andrew and Nangiles on the east. The rich and productive lodes of the United Mines pass through Wheal Clifford sett; and there is every probability that they will be as productive in it as they are, and have been, in the United Mines.—To treat for the sale, application must be made, either personally or by letter (pre-paid), to Messrs. Passingham and Simmons, solicitors, Truro.

Dated Nov. 5, 1846.

MINING OFFICES, THREE KING'S-COURT, LOMBARD-STREET, LONDON.

Mr. R. TREDINNICK, of Cornwall, being in constant communication with practical agents in the several mining districts, PROFFERS his SERVICES to capitalists and adventurers in the PURCHASE and DISPOSAL of SHARES of every description; also, obtaining authentic reports and data relative thereto. Mr. T. has on sale shares in the best dividend-paying mines in Cornwall and Devon, at from three to five years' purchase, whilst those on the eve of paying are selling at corresponding low prices. Every information afforded, on personal application, gratuitously.

BUYER in Condurrow, East Crofty, North Roskear, Wheal Jane, Cubert, Alfred Consols, Wheal Maria, West Providence, and Wheal Agar; and SELLER in West Seton, Wheal Seton, and all the best dividend paying mines in Cornwall and Devon.

MINING PROPERTY.—CAPITALISTS who are disposed to INVEST in CORNISH and FOREIGN MINES, will find the present opportunity very favourable for so doing. From large sums having been lately diverted from such investments for railway speculations, standard mines are now selling at prices that will pay the purchaser 20 per cent. per annum for his outlay. There are also other mines that are on the eve of paying dividends, which can be recommended with confidence.

Applications to be made to Mr. JAMES HERRON, mining agent, No. 3, Adam's-court, Broad-street, London.

WILLIAM H. SMITH, MINING SHARE AGENT, 10, *WARNFORD-COURT, THROGMORTON-STREET,* has SHARES FOR SALE in the following MINES—viz.:

WHEAL BLENCOWE, | WHEAL MARY PENTUAN,
WHEAL LOUISA, | WEST SHEPHERD,
VICTORIA TIN MINING COMPANY.

*** Every information will be afforded on application.

MINING OFFICES, 1, 87, MICHAEL'S-ALLEY, CORNHILL, LONDON.

WATSON AND CUELL, MINE AGENTS.—N.B.—STATISTICAL INFORMATION furnished (on application) to SHAREHOLDERS in MINES in Cornwall, Devon, Scotland, Ireland, Wales, and Spain.

WILLIAM TRENERY, DEALER IN RAILWAY AND MINING SHARES.—ESTABLISHED TEN YEARS.

OFFICES, No. 50, THREADNEEDLE-STREET, LONDON.

MR. JOHN CHAPMAN, ACCOUNTANT, MINE AND GENERAL AGENT, 17, OLD BROAD-STREET, ROYAL EXCHANGE, Returns his grateful thanks to his friends for the continuance and support he has received from them since he commenced business. He begs leave to acquaint his friends, that he now also undertakes the BUSINESS of ACCOUNTANT, in which branch he hopes to receive additional favours from them.—Nov. 4, 1846.

THOMAS P. THOMAS is a BUYER of Wheal Trelawney, Wheal Mary Ann, Wheal Trehane, South Francis, Condurrow, Stray Park, West Jewel, Wheal Seton, South Tolgus, and North Pool; and is a SELLER of United Mines, Ting-Tang, United Hills, Bertley, Comfort, Trethellan, West Trethellan, and West Tolgus.

18, *THREADNEEDLE-STREET, LONDON.*

MESSRS. LINTHORNE, JONES, AND CO., STOCK, MINING, AND SHARE AGENTS.

*** Every information will be afforded as to the market and prices of the above, by application (post-paid) at their offices,

48, *THREADNEEDLE-STREET, LONDON.*

MESSRS. R. CLARK & CO beg to acquaint their friends and the public in general, that they have taken OFFICES as below, where they intend to carry on BUSINESS as STOCK, SHARE, and MINING AGENTS; relying with confidence upon the method adopted by them for conducting all business entrusted to their agency, Messrs. R. C. & Co. solicit a continuance of that support it will be, by strictest attention to all orders, their endeavour to deserve.

N.B.—Money advanced upon scrip and other securities.

3, Austinfriars, Broad-street, Oct. 17, 1846.

MESSRS. J. PAINTER AND CO., SHAREBROKERS, MINING AND GENERAL AGENTS,

25, *CASTLE-STREET, LIVERPOOL,*

AFFORD EVERY INFORMATION as to the STATE of the MARKETS, PRICES, &c., upon application.

CHARLES T. CRAPP, SHARE DEALER, *TAVISTOCK,*

Possessing facilities of acquiring the earliest information respecting the mines of this important district, proffers his services to gentlemen desirous of obtaining such; whilst his local connection affords him the assistance of the most efficient mining agents in furnishing reports, plans, &c., of mines, to those who may favour him with their instructions.

WILSON & FRASER, 2, WELLINGTON-BUILDINGS, LIVERPOOL, and 13, EXCHANGE-PLACE, GLASGOW, have always ON SALE PIG-IRON, BAR-IRON, RAILWAY CHAIRS, and RAILWAY BARS.

WILLIAM FOX AND SON, No. 33, CASTLE-STREET, LIVERPOOL, have always on SALE PIG-IRON, RAILWAY BARS, CHAIRS, and IRON of every description.—TIN PLATES, WIRE, &c.

JOHN HARVEY, SHAREBROKER AND ASSAYER, *LISKEARD, CORNWALL.*

JAMES LANE, MINING SHAREBROKER, 75, *OLD BROAD-STREET, LONDON.*

ANGLO-MEXICAN MINT OFFICE, 5, Broad-street-buildings, Nov. 23, 1846.—Notice is hereby given, that the DIVIDEND, declared on the 5th of May, will be PAYABLE at this office daily, on and after Wednesday, the 2d of December next.—Claims to be made three clear days previous to payment.—printed forms of which may be obtained at the office. Hours of attendance, Eleven to Three.

G. B. LONSDALE, Secretary.

UNITED HILLS MINING COMPANY.—Notice is hereby given, that the SCRIPHOLDERS of this company, intending to take NEW SHARES, pursuant to the resolutions of the special general meeting of the company, held this day, must deposit in the office of the company, No. 5, Adam's-court, Broad-street, their SCRIP SHARES, and PAY the sum of £2 10s. for each new share allotted to them, on or before the 12th day of December next, otherwise they will forfeit their right to have such new shares. Every shareholder will be entitled to one new share for every four scrip shares so deposited and paid upon. By order of the board,

Nov. 12, 1846. JAMES SMITH, Secretary.

[The resolutions referred to appeared in the *Mining Journal* of the 14th Nov.]

TO ENGINEERS, RAILWAY CONTRACTORS, MINING AGENTS, IRONMASTERS, AND OTHERS REQUIRING FINE GREASE for MACHINERY and AXLES of every description.—JOSEPH PERCIVAL'S IMPROVED ANTI-FRICTION GREASE is—after trials on machinery and axles of every kind where constant friction is kept up—admitted to be the most useful, economical, and best preparation of the kind ever offered to the public.

References to scientific and practical men can be given, and testimonials shown of its great excellence.—Samples forwarded on application at the manufactory, Green-street, Wellington-street, Blackfriars-road, London.

GREEN'S PATENT FUEL ECONOMISER AND STEAM GENERATOR.

The advantage claimed for this apparatus by its inventor are—that "the feed-water is first filtered, and then heated by the spare heat from the boiler flues to 'boiling heat,' and a considerable quantity of steam generated before it enters the boiler—thereby effecting a saving of about one-third of the fuel: that is to say, one-third more steam is generated with the same boiler and same quantity of fuel." The apparatus can be applied either to new or old boilers. We extract the following description from the enrolled specification:—"My invention consists of a new combination, or arrangement, for the purpose of collecting, and applying to useful purposes, the residual heat of the air or gases passing from the flues of steam-boilers, or other boilers and furnaces, or of either, after such heated air or gases have, in ordinary cases, ceased to act with useful effect, and are permitted to make their escape and be wasted. This combination, or arrangement, consists—

"First—Of an apparatus, being a series of separate pipes, tubes, or chambers, hereinafter called pipes, placed vertically, connected at the ends by pipes, or by the cisterns, hereinafter described, through which vertical pipes, water, or other liquids, are caused to rise slowly and gradually upward; while, at the same time, the heated air and gases, passing, or having passed, from the flue or flues of boilers or furnaces, are made to circulate transversely through the spaces or compartments between and around the pipes, and to remain sufficiently long in contact with them to impart to the water, or other liquid, contained in and passing through the pipes, so much of the surplus or ordinarily wasted heat as may be required for the occasion. By this arrangement of the pipes, the gravitation of the water and liquid contained therein is made to aid the conduction of the heat from the heated air and gases in contact with them—the portions of the water, or liquid, in contact with the pipes continually ascending as they become heated, and other and colder portions succeeding; whilst, at the same time, any particles of steam that may be generated during the ascent, escape upwards, not only without impeding the general flow of the water, or liquids, but even assisting the action of the upward current.

"Secondly—Of an apparatus of cisterns, placed at the bottom of the vertical pipes, into which the water, or liquid, to be heated flows, and with which the whole of the pipes communicate; and of a corresponding number of cisterns at the top of the pipes, with which also they communicate, and which upper cisterns form a reservoir of the heated water, or liquid, from whence it may be conveyed to feed the boilers of steam-engines, or for application to any other useful purpose or manufacture. The bottom cisterns are so constructed as to collect any impurities or ingredients that may be mechanically suspended in the water, or liquids, and to admit of their being discharged at pleasure by a cock or plug at the bottom; and the upper cisterns are furnished with moveable lids, for ready access to the pipes. By these several arrangements of the pipes and of the cisterns, and the manner of passing the heated air or gases through the spaces and compartments between and around them, the hottest portion of the gases impinging on the pipes nearest the fire, and the colder on those more remote, a flow of water through the pipes is caused, proportionate to the heat applied, being quickest at the hottest part, and slower at the colder part of the apparatus—thus permitting the flow of water from the lower to the upper cisterns through each pipe, to adjust itself to the quantity of heat received by that particular pipe, and thereby equably to abstract the surplus heat from the heated air or gases. The arrangement has also the further advantage, that the upper and hotter portions of the air or gases flowing through the spaces between and around the pipes, are brought into contact with the upper and hotter portion of the water, or liquid, flowing through the pipes, and the colder with the colder portion in the lower parts—thus abstracting the heat in the most effective manner.

Thirdly—Of an apparatus of scrapers, attached to a frame, and made to encircle the pipes, which are moved upwards and downwards with a continuous and alternating motion, so as to keep the pipes continually free from any deposit of soot—thus permitting always the full action of the heated air and gases."

Fig. 1.

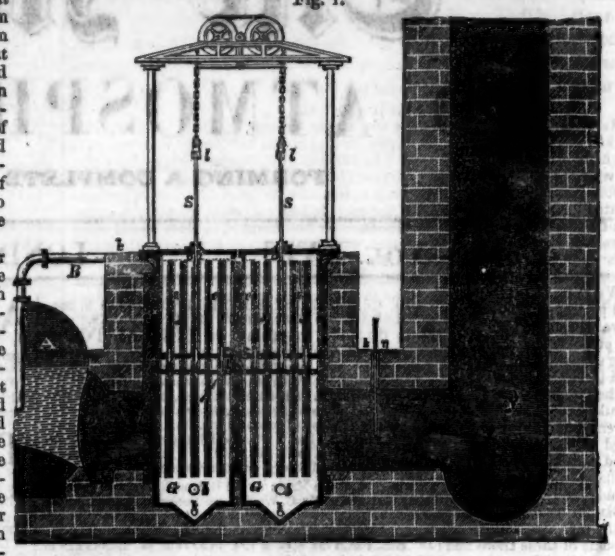


Fig. 2.

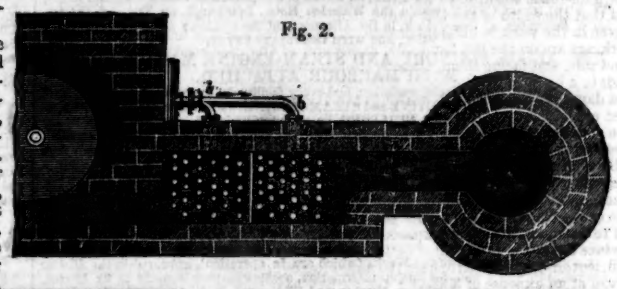
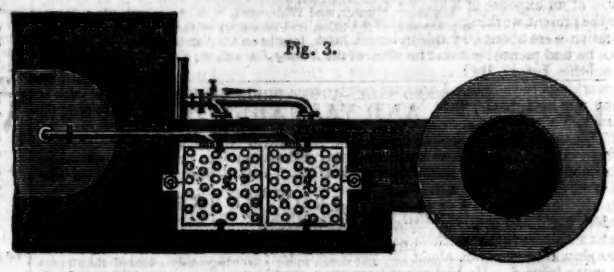


Fig. 3.



DESCRIPTION OF THE ENGRAVINGS.

A, portion of boiler.

G G, cisterns at the bottom of heating pipes *e e*, containing the feed-water before it is heated.

b b, feed pipes to the lower cisterns, G G.

B, feed pipe for conveying the water, after being heated, to the boiler.

f f, spaces, or compartments, between the heating pipes, through which the heated air and gases circulate around the pipes.

i, plug pipe, for drawing off sediment.

j, a division, to cause the heated air or gases to circulate more effectively.

k k, the walls enclosing the space containing the heating pipes.

l, opening through which the heated air is admitted from the boiler flues into the spaces between and around the heating pipes.

m, is the opening by which the air and gases escape into the chimney.

n, damper for regulating the draught.

o o, the scrapers for cleaning away the soot.

p p, the boiler flues.

q, cistern above the heating pipes.—[From the *Mechanics' Magazine.*

ANNOTATIONS ON IRON.

Iron is the most useful of all metals; it enters into every branch of the arts of civilization and there are few departments of science in which its presence is not necessary. When we contemplate such articles as the plough, the anchor, the lancet, and the watch spring, we are forcibly impressed with the wondrous resources it affords, and with its inestimable value. "Were the use of iron lost among us," says Locke, "we should in a few ages be unavoidably reduced to the wants and ignorance of the ancient savage Americans;" yet is this valuable metal, which is so essential to our wants, derived from very ungainly materials, and requires more than any other, the exercise of human ingenuity. In Britain it contributes largely to the national prosperity, and may be said to constitute the basis of its staple manufactures. The methods of its manufacture, from ore into pig-iron, and from the latter into wrought, are so well known as not to require any description here, the object of the following paragraphs being simply the collation of some leading data of practical utility, to which the growing use of this material for constructive purposes imparts increasing importance.

Pig-iron may be divided into six sorts or qualities—viz: foundry iron, Nos. 1 and 2, dark gray iron, bright iron, mottled iron, and white iron. The first is so soft as to yield to the chisel, is very fluid when melted, and will fill the most delicate moulds; it is, therefore, used for small, ornamental, and superior work, where accuracy and nicety are wanted: this iron contains much carbon. The second is harder, closer in the grain, less fluid when melted, and suitable for a heavier description of iron: it contains less carbon than the preceding. The third, containing still less of foreign matter, is suitable either for the foundry or for the manufacture of malleable iron; for castings, it is calculated for heavy work, where great strength and durability are essential. Respecting the fourth, fifth, and sixth, it need only be remarked, that the more they depart from the properties of the foundry iron, the less they are capable of being employed for castings, and are, consequently, the more confined to the manufacture of wrought-iron. The last, containing the least carbon of all, is totally unfit for the foundry—being so thick when it comes from the blast-furnace, that it will scarcely run into the pig-moulds; when cold, it is so hard that the chisel will make no impression on it, and so brittle that the largest pigs may be broken with the blow of a sledge-hammer; it can neither be filed, bored, nor bent, and is very apt to break when suddenly heated or cooled. Those qualities, then, which approach the nearest to the gray should be esteemed the best for constructive castings.

Hot-blast pig-iron is generally understood to be inferior in quantity to cold-blast, which, indeed, seems sufficiently implied by its inferior price; the latter has been referred to—1. The known inferiority of hot-blast iron under *impact*, rendering it unfit for purposes in which the greatest weight of iron is used.—2. The greater loss (amounting to 2 cwts. per ton) which takes place in remelting it.—3. the great irregularity in the contraction of castings when cooling, on which account many of different sizes are produced from the same pattern, causing great expense in their after-fitting, or, if that is not incurred, great defect in the machinery, &c., so made.—4. Its unsoundness, which, when the casting requires to be turned, bored, or planed, &c., causes defects so considerable to show themselves, probably when nearly finished, that both the casting and the expense bestowed upon it are thrown away. This decided inferiority has led to a stipulation, now common with engineers, when specifying for bridges and other similarly important works—that no hot-blast iron shall be used therein, and that the ironmaster's invoice shall be forthcoming, if required.

For beams, and other bearing purposes, cast-iron, possessing a considerable degree of malleability, is to be recommended, since that property lessens the risk of sudden failure; and, as a general rule, that is to be esteemed the best for all purposes where strength is required, which sustains the greatest degree of flexure without taking a permanent set; and also, of course, which supports the greatest load. The most flexible iron is sufficiently stiff, and it is the worst and most brittle which has the greatest degree of stiffness.

Gray cast-iron, being soft and tough, is least liable to fracture by a blow or shock, is slightly malleable in its cold state, and, when the external crust is removed, yields easily to the file. Its recent fracture is gray, with some metallic lustre, and granulated—the lustre appearing to be produced by minute particles of fresh-cut lead, distributed more or less thickly over the surface; if the iron is very tough, the dark gray colour is uniform, the texture fibrous, and the metallic lustre abundant; if less tough, while the colour is the same, the lustre is deficient, and the metal, though soft, is more crumbling, and will break with less force; in the weakest of the soft kinds, the colour is mottled with black-gray specks, and without lustre.

White cast-iron, being very brittle, should not be chosen for purposes wherein strength is necessary; but being very hard, it may be usefully employed where hardness is a desideratum, and brittleness is not a defect. When cast smooth, it makes excellent bearings for gudgeons or pivots to work on, being very durable, having very little friction. Its fracture indicates a crystalline structure, having, when recent, a white and radiated appearance, the lustre apparently proceeding from the facets of crystals disposed in rays; when the iron is grayish white, with much crystalline lustre, it belongs to the extreme degrees of hardness; when of a dull white, it is also very hard and brittle; when of a light colour, and possessing some little metallic lustre, it is the same in a less degree; but when abounding in the latter particular, and of a light gray colour, it is, besides hard, in a considerable measure tenacious: such iron is always very stiff.

Thus, by the two characteristics, colour and lustre, in specimens recently fractured, some judgment may be formed of the properties of cast-iron. In whole castings, the best test of their quality is to strike them on the edges with a hammer; if the blow produce some slight impression in the metal, indicating a degree of malleability, it is tough and good—that is, supposing it to be uniform; if, on the other hand, no sensible indentation takes place, but small fragments fly off, it is brittle and unsuitable. If, in those planes which, should have been perfectly true, the casting presents an unevenness of surface, it indicates an ununiform texture, produced by the admixture of metals of different qualities, which, having different degrees of shrinkage, produce an inequality of strength and tension in the compound that impare the casting, and render it liable to sudden failure. For this reason the utmost care should be observed to render the metal in each casting perfectly uniform throughout; for in the endeavour to procure an iron of a particular quality by mixing together different kinds, it is found difficult to blend them so thoroughly as to render the compound metal perfectly homogeneous.

Any material defect in casting, which is not apparent on inspection, may often be discovered by the sound which it emits when struck, unless it consists in internal air bubbles, which are not discoverable by this means; great care should be taken to prevent defects of this kind, and the more time that can be allowed for castings to cool, the better—the iron being tougher when cooled slowly than rapidly, and deriving much the same advantage from it as it would from the annealing process, the object of which is, by retarding the progress to the solid state, to afford the particles more facility for adjusting themselves, and thus to equalise, if not neutralise, the tension produced by the shrinkage in cooling. This is the more necessary when the parts of castings are of unequal thickness; for when the cooling in such cases is rapid and unequal, their solidity is liable to be impaired; and if the difference in their parts is considerable, they are likely to be fractured in the thin parts from the unequal shrinkage; for this reason, it is a common rule to make all the parts of a casting as nearly of the same thickness as possible, that the cooling may proceed everywhere at the same rate.

Appearing, as it does, that castings, in every respect satisfactory to all outward semblance, are yet liable to contain air-bubbles internally, and which cannot be detected by sounding, it follows imperatively, that beams which have to sustain great weights should be proved under a trial-pressure before they are used.

Cast-iron resists fracture from crushing with nearly seven times the power which it does that from drawing asunder; therefore, supposing the neutral line between the part of a beam which is in a state of compression, and that which is in a state of tension, to be in the middle of its depth, the lower and upper flanges should be unequal in the proportion of nearly 7 to 1; or, these are the proportions of strength which should subsist between the parts below and above the neutral line, however disposed.

In the late experiments for determining the best sectional form for the tubular bridge across the Menai Straits, this important fact was brought to light, that in wrought-iron the relative resistance to tension and compression is in the inverse order of that which holds with respect to cast-iron—it being found necessary, in experiments on rectangular tubing (the approved form of section), to make the upper side considerably thicker than the under one, in order to obtain an approximate coincidence in their breaking points; the exact relation which these powers bear to each other has not, we believe, been yet ascertained. The strength of a beam is not in proportion to the quantity of material—power being obtained rather by the proper disposition of the component parts; and the strongest form is found to be attained by the relation that subsists among the parts of a section consisting of a vertical web, with a flange on its upper and lower edges.

A beam loaded beyond a certain limit continually yields to the load, but with an exceedingly slow progression, unless the load very nearly approaches the breaking weight; and though cast-iron may be loaded considerably beyond what has generally been deemed prudent, the beam may be advancing, by however slow degrees, to ultimate destruction.

A load, though uniformly distributed, does not press equally, but increases with the distance from the points of support; therefore, the magnitude of a beam should be increased in like manner. The form of equal strength for a load equally diffused is a semi-ellipse, with the curve at the top; for a load applied in the middle, two equal semi-parabolas placed base to base, with the curves also at the top; and for a load between the middle and one end, two semi-parabolas in like manner, but unequal, their bases meeting in the point of greatest strain. But as mathematically, these forms occupy, in their lengths, only the extent between the points of support, an extension and spread at the ends is necessary, to afford proper bearings; such being the case, it is obvious that, in lieu of the ellipses, segments of circles, and in lieu of the parabolas, two straight lines, meeting in an obtuse angle, are the best forms to be adopted in practice. When circumstances do not admit of a beam being increased in the depth, it should be increased in the breadth instead, according to the various cases above stated, both sides being made alike.

Care should be taken to avoid making any reduction of strength in the lower half of a beam; if bolt holes in it happen to be unavoidable, there should not be one under the point immediately loaded, and they should be surrounded on each side with a rim fully compensating for the portion abstracted, and the continuity of the interrupted; in the upper half the circumstances are so different, that a series of cross-cuts down nearly to the centre have been made in a timber beam, and filled with plates of sheet metal for the purpose of stiffening it; perforations for the purpose of lightening a beam are inadmissible in the lower half, but in the upper may be effective of advantage. An extreme of depth in this material is to be avoided—for, notwithstanding that much saving is effected by making a beam thin and deep, an excess in this respect renders it rigid, and though calculated to sustain an immense pressure, liable to fracture from a comparatively small impulsive force. Patterns should be slightly bevelled, for the purpose of facilitating their removal from the sand without injuring the mould; an allowance should also be made for the contraction of the metal in cooling; the bevel may be about one-eighth of an inch in the foot, the allowance for contraction similar.

Our knowledge of the power of cast-iron columns to resist fracture by direct downward pressure is very limited; indeed, so few and vague are our data for determining their proportions, that they seem to be limited to our actual experience; so long, however, as the load is not of an extraordinary nature, and we pay any observance to symmetry, there seems little risk of our reducing their thickness so as to endanger their stability, if we may judge by the story-posts used in the shop fronts of London, which, as Tredgold remarks, are sometimes made so small in respect to their height and the load upon them, that a very slight lateral stroke would break them. But the valuable experiments of Mr. Hodgkinson tend greatly to establish sound practical formulæ on the subject, and indeed have already made considerable progress in doing so; he has found—

That there is a certain portion of height to diameter, beyond which it would be dangerous to go—the resistance rapidly lessening with the increase of height; that the relative strength of three pillars in every respect alike, excepting that the first has both ends flat; the second one end flat and one rounded, and the third both ends rounded, so that the force passes through its axis—is as the numbers 3, 2, 1; That a uniform pillar, with its ends firmly fixed, has the same power to resist breaking, as a pillar of the same diameter and half the length, with the ends rounded: also, that some additional strength is given to a pillar by enlarging its diameter in the middle; long columns give way first at the ends, showing those parts to be the weakest; the inference therefore is, that an increase of sectional area there would be attended with advantage.—*Irish Railway Gazette.*

THE AWFUL MINE EXPLOSION AT OLDBURY.

We have already entered very fully into the particulars of this dreadful calamity; but, as the investigation proceeds, it increases in interest, and the verdict of the jury gives the case an importance which was not anticipated: we, consequently, shall give the main points elicited during the several investigations before the coroner, that they may be referred to when the ulterior proceedings are before the public:—

FIRST INQUEST.

HERBERT HAMPTON (father of two of the deceased).—Had for some time worked at the pit in which the explosion took place, but that he was not in it on the morning of the occurrence; he had seen Smith, the "doggy," try the pit with the safety-lamp repeatedly, and believed he always did it. Whenever he found such a quantity of fire-damp as would cause danger, he always communicated it to the men working in the pit; he had worked at the pit 12 months, and there had not been any explosion. He had assisted to dam up old sides of work to keep out the bad air; sand, small coals, stones, and other such materials were used, but no water—this was about 2 ft. thick; all the worked-out sides in this pit are so dammed out, and he believed it sufficiently substantial.

WILLIAM CLIFT (a miner).—Two months ago I worked in the pit for two days and part of another: it was much given to damp, but middling clear of gas, it was the choke damp, and put the candle out. The third morning I went to the pit there was a side of work where it was full of fire-damp. There was a headway driven out of this side of the work, and there was also much fire-damp. I said to Holland, the "butty," that I was dissatisfied about working on that side of the pit, because there was fire-damp; it kept getting worse, and I said that I should like to have the lamp; Holland said he would take it; he lighted it, and I went with him to the side of the work of which I had complained. Holland tried the lamp, and said the place was fit to work in. I then took the lamp and tried it myself. I found that there was a great deal of fire-damp. I then said to Holland, that I would not work in that fire-damp if he would give me the pit. I told him I should go out of the pit, and I put on my clothes and went away.

Mr. THOMAS HAYNES (mine surveyor).—Produced a plan of the workings of the pit. He had superintended the workings for the last five or six years; in some of these there had been fire-damp, in others not any. There had been new gate-roads constructed for the purpose of sufficiently ventilating the pits; and that the width of the last varied from 8 to 10 ft. Headways had also been driven in the work in different directions, in order to clear it of fire-damp. The workings are on the left hand side, at the end of the gate-road; on the right hand side, and facing them, there is an open space of from 12 to 13 yards, which leads to a body of inferior coal. The gate-road leads through the working up to a dam, by which the old workings are dammed out. Witness said he had been examined several times, and considered it sufficient to prevent an explosion. Believed the explosion to have been occasioned by fire-damp having congregated in a part where a portion of coal attached to the roof had broken down. —By a Juror: He could not say with any degree of certainty that, if a dam had been put up in a certain part of the pit days ago, that the explosion would have been prevented. In his opinion, the fire-damp accumulated on the right hand side of the place where the work was going on; from thence it would force itself to that part, and there explode. The inferior coal would be more likely to produce fire-damp than that of better quality. In his judgment, he had caused sufficient air-ways driven to keep the mine clear of fire-damp. One road had been driven at an expense of 300*l.*, for the purpose of getting a greater body of air into the present workings. At the time the explosion took place, the workings in operation were about 56 yards in length, and 28 in breadth; an explosion at the place he had pointed out on the plan would be sure to affect those workings.—By another Juror: He had noticed that a change of wind materially affected the workings of the pit. Dams are mostly built with sand, brazils, and rock; about six boat loads have been used for this purpose during the last five years, and a quantity of soil independent of that; he preferred brazils for the walls for the sand to go between; about 20 dams had been put into these pits in five years; he was not aware that dams built of small coal and brazils were calculated to produce noxious gas.—A Juror said, it did not appear that means had been taken to cause a sufficient current of air to force itself through the crop, the part where the explosion was supposed to have taken place; in his opinion, there had been bad management somewhere or other in this respect.—The examination of the witness was then resumed.—He said that there had been an explosion in the mine about two years ago; that one man died, and another was much injured. He had never been prevented in carrying out his views, as to what was necessary for making the pit safe, by the proprietor.

JOHN NORTHAM.—I work at Mr. Skidmore's colliery, at Twerdale. About 12 months ago I worked at Mr. Parker's colliery for five weeks; the pit was so exposed to evils, that I left it on that account. I have been a miner 28 years, and have worked in various collieries; sometimes, when at work, the fire-damp existed to such an extent, that, when a lot of coals were about being pulled down, the men were obliged to put out all the candles. The mine wanted air; in my opinion the air ought to have been carried to the outside rib, instead of being 70 yards of it in the gate-road. I and others of the men told the butty and doggy that we would not go there every morning "brushing," as the air heading ought to be carried further. We were employed brushing more or less every morning, in consequence of fire-damp being in the pit; when we told Holland that we would not brush every morning, he said they were going to drive another stall. I have never worked in a colliery in which there was so much gas as in Mr. Parker's pit. The air headings in this part of the county are not carried far enough. Mr. Parker's pit was the worst in respect to air-heading I ever worked in. Is is better, in my opinion, to have the air by gate-roads than by air-headings.

JOHN SHAW.—I worked at Mr. Parker's pit about one year and three-quarters, and left about three months ago. I have been a miner all my life. I left the pit on account of the fire-damp, which made me unwell, existing. I complained to every man in the pit about it. I told Holland, the butty, that I should be obliged to leave the pit, and that it wanted ventilation. I recollect the pit firing one morning, and two men were burned. I have worked in a pit five or six years, during which time no explosion had taken place. I believe, if every spout was properly secured in the pit, there would be air sufficient to keep the fire-damp back. I assisted on Tuesday in getting up the dead bodies.

Mr. SILAS ELWELL (mine surveyor).—By the directions of this inquest I have examined Mr. Parker's pit this morning. I have made a sketch of the workings, which I now produce. I latched to a point where the air was carried across a gate-road by an air trow, at about 40 yards distance from the bottom. That air is carried across to the other side of the gate-road. It is a very common thing to put in trows. They are used in all collieries, but my opinion is they are inefficient. This trow is about 1 ft. 9 in. square, and carries the whole of the air which passes into the work. The air-heading goes about 20 yards further, and then opens into it. The air-head is driven as those are in most collieries; and my opinion is, they are too narrow, and not so much space in them as there ought to be. In the second gateway, where the air passes by the shaft, there, is a straight stall of work goes up. There is no air-headings carried within 120 ft. of the back of the stall. The colliery has been worked further out, but had been dammed up. I find Mr. Parker's colliery had been worked as collieries of a similar description, both as respects the gate-roads and the air-heading, but the latter should have been carried 120 ft. further. I think the pit might have been worked so as to prevent any great explosion of fire-damp. In the first place, the air-heading is defective, by being too narrow; it should have been carried on the south side of the gate-road, up to the back, and, in fact, wider the whole way. I think the point in which the wind is, frequently causes the fire-damp to accumulate. The ground bailiff is the person who generally has the management of the pit.

Mr. HAINES (engineer of Mr. Parker's pit).—No complaint had been made to him of the want of ventilation in the pit; the crop in which the accident happened was nearly exhausted, and had been ventilated by a gate-road; but, since they dammed out the old working, the communication had been cut off; but the work in question would only occupy the men two weeks more. He could not tell the cause of the explosion, unless it was through the shut coming down.

The CORONER briefly addressed the jury; after which, they returned a verdict, *that the deceased came by their death by burning, caused by the neglect of the ground bailiff, against whom they added a verdict of* MANSLAUGHTER.

SECOND INQUEST.

CHARLES KENNEDY.—I went to work in the pit six years ago, and left two years ago. At that time Mr. Haines was ground bailiff. When I worked there last, I worked in a side of work at the furthest working, and the furthest from the shaft. Instead of the air blowing out, and being carried out, the air headway was 100 yards from the side of the place in which I worked. It was not driven sufficiently into the works. That air-way ought, in my opinion, to have been carried into the works. I did not like the pit on account of the fire-damp, and I left it because I could mend myself in my work. But the fire-damp was the principal cause of my leaving. There had not been any air-heads driven into the works until they were full of fire-damp, while I was there. I worked in the pit three different times. I never made any complaints to Mr. Haines. S. Timmins and J. Stephens were the butties who worked there, while I was employed in the works. Joseph Yates and Thomas Stokes, and two others, were butty colliers in the place also; and I complained to them all many a time that there was fire-damp in the pit. I have not been down in the pit the last two years. The new gate-road now pointed out to me upon the plan has been made since I left. I have worked in Mr. Underhill's pit and Mr. Philip Williams's pit since I left, and also in other pits. I have found fire-damp in all the pits except Mr. Millerchip's. The state of the atmosphere makes a great difference in working pits. It frequently happens that fire-damp is in one part of the pit, and not in another. It has been the case, that when fire-damp is in one part of the mine, the men have been at work in another; but it is a dangerous experiment to work anywhere. If the fire-damp is at two distinct sides of the pit they might, perhaps, work with safety. I was twice burned in this pit of Mr. Parker's, and I was also burned in Mr. Williams's pit. I was seriously burned, when it took me in the head. I have seen explosions when no injury ensued

Juror.—What did the butties say when you complained to them?—Witness.—They said they would have an air-way driven up when permitted, and they had seen Mr. Haines.

Juror.—Was the air-head driven up?—Witness.—Yes, when they could not help it. Stokes was the last butty I complained to. When I was burned seriously, I was making the head-way.

Mr. J. O. BRITTLE, of Dudley (mine surveyor).—On Friday last I, in company with Mr. Yardley and Mr. Silas Elwell, went down into Mr. Parker's pit. I found the blowing gate-road full of fire-damp. The drawing gate full of sulphurous gas. The doors of the gate were broken. I could not make an inspection of the pit then, in consequence of the choke-damp, but requested Mr. Haines to have the dams properly secured, and the air-heads cleared. I went down yesterday with Mr. Yardley, Mr. Elwell, and Mr. Haines, and the pit was then in a state to enable me to make an inspection of it. We examined the pit from one end to the other in every place, and only found fire-damp in one place—and that was a small portion in a spout in the gate-road, and not in the work. I found the gate-roads and general state of the pit as if an accident had occurred. The gate-roads were driven in the usual way in which they are driven in this neighbourhood. There was a side of work, with proper air to expel fire-damp. The gate-roads were driven so as to carry a sufficient body of air into that side of work in operation, and expel the fire-damp, if any was there. This was the side of work in which the explosion took place. I attribute the explosion to one side of work not having been properly ventilated. In my judgment there should have been a pair of doors at the top of the new gate-road, and the air-head continued along the boundary on that side of the work, and up to the crop. I consider the place where the men were at work sufficiently ventilated. It was the duty of the ground bailiff and the butty to see that the doors and the air-head were made. It was the duty of the butty to give notice of anything wrong. If the butty discovered anything wrong in the pit, that there was fire-damp, he ought to give notice to the ground bailiff. The butty would know if it was necessary to have such doors put up and air-ways driven, as I have described. The state of the atmosphere would have a great effect upon the fire-damp in a coal pit. When the wind is in a particular point from south to south-east in this neighbourhood, or in damp or foggy weather, the circulation of the air in the mines is not so good as in a clear atmosphere. The fire-damp formerly compressed expands, and diffuses itself over the pit. In clear weather the circulation is better. The butty, and also the doggy, would be the first persons to discover the fire-damp in the pit; and they would know the doors ought to have been up where I have described, and the air-way driven to the boundary; and it was their duty to have informed the ground bailiff. If there had been an accumulation of fire-damp in that part of the pit, where the coal was faulty, and the roof had given way, it would have the effect of forcing the fire-damp into that side of the pit where the colliers were at work, and the gas coming in contact with their candles, would cause an explosion: such explosion would have the effect of igniting any fire-damp that might have accumulated in the side of the crop. In my judgment the roof fell before the explosion. I survey other mines in this neighbourhood. I recollect the state of the atmosphere on Tuesday last—it was windy and raining—a very bad day for fire-damp; and the men in a great many pits were at play on that day, on account of the fire-damp. On Friday last, the atmosphere was also unfavourable for coal-pits. When I examined the pit yesterday, there was no bad air. In my opinion, there may have been days when there was no fire-damp in the side of work in the crop. I do not know anything of Holland, the butty. I think it is a better mode to ventilate mines by gate-roads, than air-heads. Gate-roads are more effectual than air-heads. The gate-road in the pit must have been driven at considerable expense, considerably more than double the cost of the air-head. A gate-road would let out the air better than the top air-head. The size of an air-head ought to be 3 ft. 6 in., but they are generally driven from 2 ft. to 3 ft.

Mr. YARDLEY (mine agent and ground bailiff).—I have the management of several pits in this neighbourhood. I accompanied the last witness in the survey of the coal-pit, which is the subject of this inquiry. I have heard him examined, and I quite concur in the evidence he has given. I have known Holland, the butty, and considered him a very careful, steady, prudent man. I think he would not have run any risk, if he had seen any danger. On Tuesday and Friday, I discovered that the atmosphere had an effect upon the pits, causing the gases to collect. It does not affect so much in south-east as in south-westerly winds.

JAMES STANFIELD (butty collier), employed in Capt. Bennet's pit, deposed, that, on Tuesday morning last, the men could not work in his employer's pit, owing to the bad air caused by the atmosphere.

The CORONER then caused the whole of the evidence to be read over, and commented upon it—observing, that he saw no grounds for attaching blame to any person.

The jury deliberated for an hour; and, at half-past six o'clock, returned the following verdict:—We find a verdict of "accidental death," but beg to express our opinion, that there has been neglect, and which is to be attributed to the ground bailiff, *for the imperfect ventilation of the works.*

THIRD INQUEST.

The evidence adduced varied but very little from that before taken, and the CORONER, in summing up the case, expressed a strong opinion that a charge of manslaughter could not be supported against the ground bailiff.—The jury then returned a verdict of "accidental death," but at the same time censured Mr. Haines, the ground bailiff, on account of the imperfect ventilation of the pit.

Two other inquests were held, but the evidence was merely a repetition of the foregoing.

In the Bail Court, on Wednesday, Mr. Whitmore obtained a rule to admit Mr. Haines, the ground bailiff (who had been taken into custody after the verdict of manslaughter), to bail.

ACCIDENTS IN MINES—PUBLIC MEETING.

On Monday last, a large meeting of colliers and other working men was held in Dudley, on the subject of the late dreadful mine accident at Round's-green, the particulars of which were detailed in our last Journal. A collier, who was voted by the meeting to be the chairman, spoke at considerable length on the oppressive and hurried labour to which the men are exposed.

Mr. SAMUEL COOK then addressed the people on the causes of mine disasters, which he considered to be occasioned by various causes—the want of better architecture in constructing the pits, the want of proper ventilation, too erect cuttings, the negligence of engineers, bad ropes, bad scaffolding, bad safety lamps, and negligence in the use of the Davy lamps, and the gas in them. He considered that there was a responsibility for the accidents which so frequently happen resting upon the mine owners, bailiffs, butties, doggies, and the men themselves. He considered that these accidents were not necessarily and inevitably connected with coal-getting—that God had not necessarily connected the one with the other. He thought that the gas might be carried to the surface and returned to the pit again, to light it with. He proposed a memorial to Sir George Grey, requesting that the Government would introduce a measure on the subject into Parliament, immediately on its assembling; and for Government to send down to investigate the late case, and to appoint mine inspectors.

Several colliers spoke of imminent danger in the mines, and that this chiefly arose from the want of spending more money upon them.

The following memorial was agreed to:—

Memorial.

The respectful memorial of the inhabitants of Dudley, and neighbourhood, in public meeting assembled, Nov. 23, 1846, to Sir George Grey, Secretary of State for the Home Department,

Showeth,—That your memorialists, from a solemn regard to the interests of humanity, deem it a duty the most serious and imperative to submit, for your consideration, the following lamentable facts, with the full confidence that you will forthwith devise some legislative measure to prevent, as far as human means can, a calamity of such frequent occurrence in the mining districts:—

On Tuesday morning, the 17th inst., an explosion of gas occurred in a coal mine, the property of Mr. Parker, situated at Round's-green, where 25 miners were employed, which caused the instant death of 19 men, in the most horrid manner by which human life could be destroyed. Three of the others were so seriously burned that one has since died, and another is scarcely expected to survive: 14 of the sufferers were married, and have left 14 wives and children, who were entirely dependant on the men's labour. The destitute condition and misfortune to which these families are thus exposed must commend them to the commisseration of every humane mind, and render it a most solemn obligation on the part of Government to avert consequences of so fearful a nature.

Your memorialists would, therefore, implore your serious consideration of the preceding facts. That the Government will view such calamities with indifference, we cannot for a moment suppose; and though your memorialists may lament that the Legislature has not heretofore, from various causes, adopted some comprehensive measure to afford better protection to life in the perilous occupation of mining, either by offering a sufficient encouragement for the discovery and effective process of ventilating mines, or by the appointment of efficiently qualified inspectors, to see that the means for this purpose now in practice are properly carried out, still your memorialists trust that the present administrative Government will feel the responsibility of calling the attention of the Legislature to this important subject immediately upon the meeting of Parliament.

Your memorialists cannot but feel assured that you will concur in the necessity and propriety of such a step, and the more especially as your honourable predecessor, Sir J. Graham, in a communication of reply to a letter from Mr. S. Cook, of Dudley, relating to a similar accident, which occurred in a coal mine at Twedale, near Dudley, in the month of August, 1845, stated that the subject was under the consideration of the Cabinet, and appointed Mr. Playfair to investigate the circumstance of the accident referred to: which inquiry, your memorialists regret to say, was abruptly broken off, in consequence of Mr. Playfair's being called to Ireland to investigate the cause of the failure of the potato crop.

Your memorialists would, in conclusion, urgently pray that you will at once appoint a commission of inquiry to investigate the cause herein stated; for the twofold purpose of satisfying the public mind, and supplying further evidence to aid the Government in maturing the measures sought for in this memorial, and which the personal safety of an important and laborious class of workmen imperatively requires.—Your memorialists, &c. &c.

CAUTION TO MINE ENGINEERS.—On Tuesday last, at the Bilston Police Court, B. Fletcher came before the bench, in answer to a summons charging him with having neglected the service of Mr. W. Shales, by which he had done considerable damage. It appeared that, on Monday last, the defendant was employed in working an engine to raise water from a neighbouring pit belonging to the prosecutor: during the night he fell asleep, and the engine ceased pumping, which caused the pit to make so much water, that the men could not work. The defendant was ordered to pay 1*l.*, and costs; but from the good character he had always borne, the complainant consented to take him back into his service.

DIED,—On the 6th inst., at Bromford Iron-Works, West Bromwich, where he had resided upwards of 60 years, Mr. John Downing, in the 91st year of his age. His death, we regret to say, was occasioned by a severe accident to his leg.

MINERAL RESOURCES OF THE SAMBRE AND MEUSE.

Messrs. Sopwith and Smith, civil engineers, have just reported on the mineralogical capabilities of the district *entre* Sambre and Meuse, showing the existing condition and prospective value of the coal mines in that part of Belgium, producing, upon calculation, a quantity equal to one-tenth of all the coal raised in Great Britain, and upon the apparently exhaustless deposits of iron ore, more particular with reference to the iron mines at Couvin, and the favourable opening presented for the introduction of trading enterprise. Mr. Sopwith states, in the progress of his survey, he was much impressed with the comparatively inactive state of this, and other works of a similar description; and on inquiry, found that the tide of prosperity, which might reasonably have been anticipated from such a concurrence of favourable conditions, had been checked by adverse circumstances, arising from the revolution in 1830, and the subsequent commercial embarrassments in 1838 and 1839, which are well known to have caused so much loss and interruption throughout the whole of the industrial establishments of Belgium. From these great and ruinous causes of depression many of these works never revived—others in time began slowly, and under great disadvantages, to resume operations; but at the period of his first survey, the effects produced, by the evident *want of capital* were as apparent on visiting such works, as if the very words had been legibly inscribed in every part of the premises. It is, however, but just to add that they are now almost without exception doing well. The Couvin Iron-Works had a further disadvantage to contend with, by reason of the distance from the coal-field of Charleroi, and by the expense attending the carriage of materials of every description. Its comparatively secluded position naturally retarded its progress. Considered as regards the site of the works—their extent—their contiguity to iron mines and to water power.—Couvin possessed extraordinary advantages; but *want of capital, and the absence of cheap means of transport*, fully account for its having remained up to this time in comparative inactivity. If these defects were still to continue, it is evident that an iron-work so situated would offer little inducement to the capitalist. The serious evil of *expensive carriage is on the point of being wholly removed* by the completion of the Sambre and Meuse Railway. The great facilities of conveyance thus furnished to Couvin will be at once understood by an inspection of the maps which accompany his report. The other, and still more serious evil of the *want of capital*, is proposed to be remedied by the formation of a company under the arrangements contained in the sequel.

The Couvin Iron-Works are situated in the southern part of the district of the Sambre and Meuse, about 27 miles south of Charleroi, about six miles from the boundary of the department of the Ardennes, which here forms the north-east frontier of France, and 13 miles from Vireux, which is the terminus of the Sambre and Meuse Railway, on the river Meuse. Couvin has, therefore, a direct river communication southward with the departments of the Ardennes, the Meuse, the Marne, and the Aisne, in which are the important manufacturing towns of Charleville, Mezieres, Sedan, Rhetel, Rheims, &c., and a population of nearly 2,000,000. In a northern direction Couvin is placed in communication, by means of the river Meuse, with the towns of Givet, Dinant, Namur, Huy, Liege, Maestricht, Rotterdam, the whole of Holland, the Rhine, and north-eastern parts of Germany. The Sambre and Meuse Railway, now rapidly progressing towards completion, passes half a mile in length immediately in front of the principal works (being only 20 yards from the gates). This railway opens a direct and valuable means of communication with the coal-fields of Charleroi and Mons, with the Government railways throughout the whole of Belgium, with the railway from the Sambre to Louvain, and that from Charleroi to Erquilines, which latter railway forms the first link of a direct route from the south of Belgium to Paris, by Maubeuge and St. Quentin. It is, moreover, in contemplation, and may be deemed almost a matter of certainty, that Couvin will shortly obtain a railway communication through the departments of the Ardennes, the Marne, and the Meuse, as well as with the Paris and Strasburg line, by means of a railway from Couvin to Sedan, Charleville and Mezieres, with a branch to Rheims. Surveys of these lines have already been made southward from the Belgian frontier, by order of the French Government. The Sambre and Meuse Company is bound, by its act of concession, to effect a junction with the above-named French lines, by extending their present line from Couvin to a point on the frontier near Rocroy, as soon as the execution of the French part shall have been determined upon. The extension will pass through the Couvin property, and connect the whole of the land and works with the principal establishment at St. Roch. The Couvin Iron-Works are situate partially in the commune of Couvin, and partly in that of Bruly, in the arrondissement of Philippeville, in the province of Namur. The river Eau Noire and the rivulet Du Prince, which run through the property, furnish a vast amount of water power.

The beds of limestone in the immediate contiguity of the works contain vast deposits of iron ore, in pockets or funnel-shaped cavities, the quality of which is superior to any produced in Belgium, and their proximity to the surface admits of their being worked with great facility. The same description of ores are also occasionally found in veins throughout the district.

These deposits of iron ore extend upwards of 70 miles in an east and west direction. Towards the western extremity, near the villages of Forge and Boulers, masses of plastic clay are found, from which the best fire-bricks are made. The principal deposits of iron ore which are now being worked, are situated at Couvin, and extended to Petigny, Nismes, Olloy, Dourbes, and Vierve, on the east, and to Pesches, Boileux, Boulers, &c., on the west. The mines to the eastward abound in the stronger quality of ores; those to the west are less refractory, and mix well with the others,

We shall return to this subject in our next Journal.

MINING IN AUSTRALIA.

At a time when so many of the labouring population of the mining counties of Cornwall and Devon are emigrating to that "land of promise"—South Australia—the following interesting communication, which has been just received from the colony, will be read with much interest: the letter, which is dated Adelaide, 17th June, was written by Mr. James Curnow, who left Cornwall for Adelaide in 1841, and addressed to his friend, Mr. William Allen, of Penzance:—

"I now fulfil my promise, made on my leaving in 1841, of furnishing you with some information which may be useful to many of my friends in Cornwall, and others intending to proceed to this part of the world. I shall carefully guard against any representation that may mislead, or exaggerating, and the facts I shall state may be relied on. The most attractive element of wealth now known in the colony, is unquestionably our minerals. The quantity of copper ore jutting out on the surface, is incredible, and I am confident is not equalled in any known part of the world. The quantity of ores raised at the Burra Burra Copper Mines, in six months, is 2900 tons, which produce has been obtained by 30 to 50 working miners—in fact, it has not been *mining*, but more properly *quarrying*. The miners of Cornwall will easily understand the importance of this mine alone: I could enumerate 8 or 10 others, of a most valuable description—but this one will be sufficient to shew the extraordinary nature of this province in a mineral point of view; as an illustration of which I would direct attention to the quantity of ore shipped to England, including several cargoes direct to Swansea, in the short space of two years, with a mining population not exceeding 200. * * * * * * * The other metals found here are lead, silver, and gold—a rich vein of the latter having been found in several places in the virgin state. There are other metals reported to have been discovered, but which I have not yet seen—such as tin, quicksilver, platina, &c. The money paid to Government, within a short time, amounted to about 80,000*l.*; and on Saturday last, 30,000*l.* worth of land was purchased at public auction for mining purposes. Besides this, one or two special surveys, of 20,000 acres each, are about to be secured by old settlers, in a new district, which is most important, as the breadth of the area of our mineral district will thereby be considerably extended. Ores having been found on the *surface* in numerous places for about 150 miles in length, running north, and about 80 to 90 miles in breadth, from E. to W. In fact, on other parts settled, such as Port Lincoln, beyond these limits, various discoveries have been made, and yet we are comparatively ignorant of the real extent of our mineral wealth. The greatest want now felt, is the scarcity of labour of every description, but more particularly of working miners. I can state, from personal knowledge, that *tributers* have been getting lately from 6*l.* to 20*l.* per week! and men that never saw a mine before, get 2*l.* per week. These wages are further enhanced by the low cost of provisions, and other necessaries of life. To give some idea to those unacquainted with the variety of productions which abound in this colony, I may enumerate the articles of wool, grain, gum, bark, whalebone, and oil, which, themselves, are enough to make this a prosperous community. I think I may say with truth, that such a concentration of the elements of wealth that we possess, is without precedent. The climate of South Australia is most healthy. The general opinion in England as regards the supply of rain, is very incorrect. The experience of 10 years shows that no real scarcity of water has been experienced during any one season. The hot winds which prevail during summer for a short time, are, I may say, the only drawback in this colony. Female servants' are much wanted—girls of good character are readily engaged at 20*l.* per ann.'

MOSSGIEL COPPER ORE.—The workmen at the tunnel at Mossgiel, near Mauchline, an account of which appeared in our last, have, within the last few days, discovered a rich vein of copper ore.—*Ayr Advertiser.*

SUBSTITUTE FOR SILVER.—The most perfect substitute for silver that we know of is gold.—*Almanack of the Month.*

Mining Correspondence.

ENGLISH MINES.

ALFRED CONSOLS.—Since the period to which the paragraph in the last week's *Mining Journal* refers, when it was stated that the lode was upwards of 20 ft. wide, we are informed that a further increase in the size, and improvement in the quality, of the lode has taken place. The adit level has been driven upwards of 50 fms. on a good productive lode, varying from 5 to 21 ft. —the latter being the size now in the eastern end, and worth 70*l.* per fm. The engine-shaft, which is sinking on the lode, is down 7 fms. under the adit; the lode here is about 5 ft. wide, and contains a good branch of copper ore; the eastern end is driven about 33 fms. from the shaft. The steam pumping engine of 60 in. cylinder is now ready to work; but the quantity of water in the shaft has been hitherto too small to render it necessary. A steam-whim, crusher, and stamps, are in course of erection. The next sampling is expected to exceed 200 tons.

BARRISTOWN.—The lode in the 24 fm. level, west of engine-shaft, is still without alteration—poor. The lode in the 18 fm. level end, west of flat-rod shaft, is producing 1½ ton per fm. The 12 fm. level, west of flat-rod shaft, is producing 1 ton per fm; the adit end east is producing stones of ore. Nothing new at Clon Mines. The tribute pitches are looking well; I hope to have another cargo (45 tons) ready about the middle of December. We have been delayed a little in the 28 fm. level, owing to the flat-rods being too weak; we have been obliged to substantiate larger iron.—T. Angove: Nov. 20.

BEDFORD UNITED.—At Wheal Marquis, the lode in the 80 fm. level east is 18 in. wide, saving work. In the 70 fm. level east the lode is 2 ft. wide, composed of spar, mundic, and ore; the lode in Crew's winze, in this level, is 2 ft. wide, and worth 8*l.* per fm.; and in Michell's winze the lode is 18 in. wide, and worth 6*l.* per fm. The winze in the 58 fm. level having been holed to the 70 has enabled us to resume driving this level, and there has been no lode taken down. At Wheal Tavistock, in the 47 fm. level east and west the lode is 2 ft. wide, producing a little saving work. In the 35 fm. level east the lode is 18 in. wide, composed of spar, mundic, and spots of copper ore in places. The south engine-shaft is 20 fms. 4 ft. 6 in. below the surface, the lode 6 ft. wide, gossan, spar, and ore, very kindly. There is no alteration in the adit level since last reported.—James Phillips: Nov. 24.

CUBERT SILVER LEAD.—There is nothing new to notice this week, different to what I wrote you on the 14th inst.; I will, however, recapitulate: at the 25 fm. level, driving east on Trebiskin lode—at present it is small and unproductive; going west at this level the lode is 1 ft. wide, yielding stones of ore; the middle lode here is 2 ft. wide, chiefly hard spar, with mundic, and spotted with lead. At the 15 fm. level, driving west, on Trebiskin lode, it is 10 in. wide, and saving work; in the same level, going east, the lode is 1 ft. wide, worth about half a ton of lead per fm. The ground in the engine-shaft is much the same as it has been. The prospects, on the whole, in the tribute department, we consider fair.—Richard Rowe.

EAST TAMAR CONSOLS.—At Whitson, the men in Hitchins's engine-shaft are getting on very well in sinking. In the 54 fm. level north and south the lode is 2 ft. wide, fluor spar and good stones of silver-lead ores—a very kindly looking lode. In the 46 fm. level south the lode is 1 ft. wide, ground hard for driving, but we expect an improvement in this level very soon, as we are getting under the old workings that were made in the level above. At Furzehill, the shaftmen have completed the trip plat, and recommenced sinking; the lode in the shaft is 2 ft. wide—a very promising lode. In the 38 fm. level north and south we are opening ground that will set at a moderate tribute. In the 30 fm. level south the lode is 18 in. wide, good work; our great object now is to force down our engine-shaft with all possible dispatch, and open ground for the tributers.—B. Robins: Nov. 23.

GREAT MICHELL CONSOLS.—The ground in the engine-shaft, sinking below the 22 fm. level, is favourable; in the 22 fm. level, east of the engine-shaft, the lode is without important alteration, composed of gossan, and stones of ore in places; in the 22 fm. level west the lode continues, containing gossan, spar, mundic, and spots of copper ore.—T. Richards: Nov. 24.

GREAT WHEAL MARTHA.—We beg to inform you, that the new engine-shaft is sunk 26 fms. 5 ft. 6 in. below the deep adit level. A breakage of the balance rod prevented the sumpmen working in the bottom of the shaft any part of this week, nevertheless the 30 will be reached quite as soon as we reported to you. Nothing has been done at Sherral's bottom since our last report, the men having been engaged in selecting the mundic, which is being carried to quay, and will be shipped as soon as the vessel arrives. A very promising lode having recently been discovered in the adjoining sett, we have this day visited the mine, and find the lode is running in our sett, a little to the south of Barnlight lode: we examined several other promising lodes; and, from their bearing and underlie, there is not the least doubt but that every one of them may be found in our ground, and two of them at no great distance from our present workings.—J. Prince; T. Penaluna: Nov. 21.

GUNNIS LAKE.—The lode in Bailey's engine-shaft is 3 ft. wide, composed of gossan and spar, with stones of ore in places. The lode in the 12 fm. level east is 2 ft. wide; and in the 12 fm. level west 2½ ft. wide, producing a little saving work.—W. Richards: Nov. 24.

HANSON.—Our sumpmen have finished the plat spoken of in my last, and have sunk about 3 ft. below the 22 fm. level. In flat-rod shaft, they have not taken down any of the lode, and could do no more with the water; and they are now employed in fixing the work to get a sett to work, which will be drawn by the engine; we hope it will be put in operation by the middle of this week. In the 32 fm. level east of engine-shaft, on Stainsby's lode; the lode is 3 ft. wide, with some ore. In the 32 fm. level, west of engine-shaft, the lode is 2½ ft. wide, unproductive. On the 17th inst., we sampled 32 tons of ore.—Z. Williams: November 23.

HAWKMOOR.—The lode in the 15 fm. level, east of Hitchins's shaft, has improved in appearance since my last, being upwards of 2½ ft. wide, composed of spar and mundic, with fine stones of copper ore. I hope that, by another week to be able to report something of a more pleasing character.—P. Richards.

HOLMBUSH.—The shaftmen are still engaged in stoping down the piece of ground below the 110 fm. level, which is producing some very good ores. The lode in the 120 fm. level, west of the east cross-course, is 15 in. wide, and worth 20*l.* per fm.; in the same level, driving east of Hitchins's, the lode is much the same as last reported on—we have suspended this end for the present, and set to drive north, to effect a communication with the other levels. In the 120 fm. level, west of the winze (on the north part), the lode is 10 in. wide, and worth 6*l.* per fm., and is likewise suspended for a short time, and the men set to drive south towards the other level, to effect a speedy communication. The lode in the rise, above the 110 fm. level (on the north part), is 10 in. wide, composed of mundic and stones of ore; the lode in the 110 fm. level, west of the lead lode, is 1 ft. wide, and worth 6*l.* per fm.—we have not cut through the lead lode at this point, there being not sufficient for two pares of men to work at one time, until we fix air pipes in the level to convey it into the end, which we intend doing; the lode in the winze, sinking below the 110 fm. level, is 1 ft. wide, and worth 7*l.* per fm. The lode in the 100 fm. level south is 3 ft. wide, composed of flookan, spar, and occasionally stones of lead; the pitches, in the back of this level, are producing some very good lead ores, and the men making moderate wages in their tribute.—W. Lean: Nov. 24.

LOSTWITHIEL CONSOLS.—We continue to pass through floors of fine hard spar, interspersed with bright yellow mundic, which indicates a mineralised country, and that the lodes in the vicinity are strong and good. The water boils up freely from the bottom, at the rate of 100 barrels per eight hours. The shaft is down below the 12 fm. level.—J. Eustice: Nov. 24.

MENDIP HILLS.—The lode in Stainsby's shaft has greatly increased in size since my last report, it now being 7 ft. wide, consisting chiefly of quartz, with dark-coloured flookan, intermixed with particles of lead, presenting a very promising appearance: this shaft is sunk 5 fms. 2 ft. below the 138 fm. level. The stopes in the bottom of the 20 fm. level, north of Somers's shaft, continue to produce a little lead, but have very much failed during the past week.—F. C. Harpur: Nov. 23.

PENTUAN WHEAL MARY.—We are driving into the hill, for the purpose of cutting the main lode, with all possible speed. The ground through which we are driving still holds out its former improved character, with great prospect of success.—J. Chynoweth: Nov. 24.

SOUTH TAMAR UNITED.—The masons are getting on with the buildings as fast as possible; the smith's shop is built, and they are getting on with the engine-house as fast as the weather will permit; there is no doubt that the house will be up in time for the machinery to heave in. We have also erected a whim on the adit shaft to clear the adit, which work is necessary to be done. —B. Robins: Nov. 23.

TINCROFT.—We have cut a branch, containing good quality ore, in the 100 fm. level cross-cut south; we are continuing the cross-cut south, and hope to cut the other part of the lode in a short time. The lode in the 90 east is 8 ft. wide, producing good stones of ore, and kindly; we have not yet cut the lode beyond the cross-course, in the 90 west, but must be very near the lode, as the water is drained down from the winze sinking below the 80. The lode in the 80 east is 2½ ft. wide, producing some ore; the lode in the 80 west is 2 ft. wide, and worth 15*l.* per fm.; one of the pitches in the bottom of the 80 has very much improved in the last few days. The lode in the 70 east is large, producing tinstuff; the rise in the back of the 70 west, and the winze in the bottom of the 60, are producing some ore. Our tribute department continues much the same as for some time past. Palmer's shaft is nearly complete to the 80 fm. level; we shall soon be driving west at that level. The lode in the 70 west is 3½ ft. wide, and worth 10*l.* per fm.; the pitches in this part of the mine continue to produce fair quality ore. The different places in the south mine continue to produce fair quality tinstuff—equally good as last reported. We are getting on very well clearing Wheal Providence adit; we are driving towards the lode from the new shaft, at the adit level. On the whole, our prospects continue very cheering; we expect to sell 1100*l.* worth of tin next Wednesday—three weeks and one day from our last sale.—W. Paul: Nov. 23.

TAMAR SILVER-LEAD.—In the 160 fm. level the lode is 18 in. wide, composed of capel, with spots of ore. The 145 fm. level is in slidy ground, and unproductive. In the 135 fm. level the lode is 2 ft. wide—work of a coarse quality. In the 125 fm. level the lode is 2½ feet wide, good work—a very promising end. In the 115 fm. level the lode is 3 ft. wide, 1 ft. of which is rich work, and of a promising character. In the 105 fm. level the lode is 15 in. wide, producing a small quantity of ore. In the 145 fm. level, north of the shaft, there has been no lode taken down since last reported. The inclined plane shaft is sunk 19 fms. below the 115 fm. level. At the north mine, in the engine-shaft, the lode is 4 ft. wide, composed of capel, with strings of mundic. In the 60 fm. level, north of the shaft, the lode is 3½ ft. wide, producing good stones of ore. At Wheal Hancock we are still cross-cutting east. At Hole's Hole we are also cross-cutting towards the lode; the ground is composed of killas, with strings of mundic, of a congenial appearance for silver-lead ores.—J. Sprague: Nov. 23.

TRELEIGH CONSOLS.—In Christoe's shaft, below the 100 fm. level, the men are fixing lift, nothing sunk; in the 100 fm. level, east of ditto, the lode is about 1 ft. wide, and we are driving north in search of more lode; in the 100 fm. level, west of ditto, the branch is small, no mineral. Garden's shaft, below the 90 fm. level, is sinking in the country, ground hard. In the 90 fm. level, west of ditto, the lode is 3½ ft. wide, worth 35*l.* per fm. In the 80 fm. level, west of ditto, the lode is 20 in. wide, more kindly, producing good stones of ore. In the winze, below the 70 fm. level west, the lode is 18 in. wide, not much ore; in the 70 fm. level, west of Good Fortune, the lode is 3 ft. wide, little ore; we are driving north to find more lode. In the 60 fm. level, west of Symons's, the lode is 18 in. wide, worth 3*l.* per fm. In the 50 fm. level west, on the north lode, the lode is 1 ft. wide, generally in flookan, no mineral. In the 44, west of ditto, the lode is 10 in. wide, producing a small quantity of ore. The adit cross-cut is driving south to the western shaft.—W. Symons: Nov. 21.

TREVISKEY and BARRIER.—At Treviskey, in the 176 fm. level, 17 fms. east of the shaft, the lode is small and unproductive. In the 200 fm. level, 16 fms. east of the shaft, the lode is 2 ft. big, and worth 12*l.* per fm. The men hitherto employed in driving this level, are now sinking a winze close to the end in the 200, and are down about 9 ft.—the lode here is worth 40*l.* per fm. The men belonging to the 212 fm. level, are now sinking a winze 18 fms. east of the shaft, and are down about 4½ fms.—the lode here is unproductive. In the shaft sinking 8 fms. below the 224 fm. level, the lode is 3 ft. big, and worth 40*l.* per fm. In the 236 fm. level, 4 ft. east of the shaft, the lode is 4 ft. big, and worth 40*l.* per fm.—the men belonging to the 236 are now rising against the shaft; the lode in the rise is worth 40*l.* per fm. We sampled last week 226 tons of ore, and expect to sample for November and December about 230 tons. At Barrier, in the winze sinking 11 fms. below the 236 fm. level, the lode is 18 in. big, and producing stones of ore. From this winze and our three pitches, we expect to raise about 90 tons of ore for November and December months. We sampled last week 100 tons.—Joseph Jennings: Nov. 16.—[We gave the accounts presented at the meeting on the 16th, in last Journal.]

UNITED HILLS.—In the 90 fm. level, eastern end, the lode is 3½ ft. wide, producing a small quantity of ore; in the western end the lode is 3 ft. wide, 2 ft. ore of good quality; in the eastern stopes the lode is 2 ft. wide, 18 in. good ore; in the western stopes the lode is 2½ ft. wide, 20 in. ore of good quality. In the 80 fm. level, eastern end, the lode is 3 ft. wide, 1 ft. ore of fair quality, improved since last reported; no alteration in the cross-cut. In the 70 fm. level, eastern end, the lode is 18 in. wide, 1 ft. ore of average quality; in driving north we have cut the south part of the lode, which is yielding some stones of ore; in the eastern shaft the lode is 4 ft. wide, 2 ft. ore of good quality. In the 60 fm. level the lode is 3 ft. wide, producing ore throughout of average quality. In the shallow adit the lode is 3 ft. wide, poor. At Wheal Charles, in the 50 fm. level the lode is 2 ft. wide, coarse in quality. In the 40 fm. level the rise is communicated to Mouckton's shaft; we shall now resume driving the 40, east of said shaft. At Wheal Sparrow, in the 40 fm. level, the lode is 2 ft. wide, ore of average quality. In the 30 fm. level the lode is 2½ ft. wide, producing but a small quantity of ore. In Turner's shaft the lode is 3 ft. wide, 2 ft. ore of fair quality.—T. Trevenen; R. Williams: Nov. 24.

VICTORIA.—During the past week, our men have been engaged in making leats, &c.; I beg to inform you, that we have commenced operations to the fullest extent as far as it is thought practicable for the present. We have set the wheel to build, and, in the meantime, preparation will be made for the engine to be set to work on the first Wednesday in January, 1847; by virtue of which, it is my opinion that large returns of tin will be made, when we get our shaft down to the 12 fm. level.—J. Chynoweth: Nov. 24.

WEST SHEPHERDS.—We are at present driving only two ends—one at the 12 fm. level, east of engine-shaft; the other at the 20 fm. level, west of ditto. The end at the 12 fm. level is in an improving condition; the lode is from 2 to 3 ft. wide, carrying with it a small leader, producing some good stones of lead; we expect to see a much greater improvement in this end very shortly, as we are getting very near a north and south lode, which runs through the sett. The end at the 20 fm. level is in a state of progressive improvement; the lode varies from 1 to 2 ft. wide, carrying with it a leader from 2 to 3 in. wide, producing some excellent stones of silver-lead ores. The stratum of ground around the lode is much more favourable than it has ever been before at this level. We hope in about two months to come in contact with the course of ores gone down in the bottom of the 12 fm. level. Altogether, the mine is in a very promising condition.—T. Hooper: Nov. 24.

WEST WHEAL JEWEL.—In the 115 fm. level, east of Hay's cross-course, on Wheal Jewel lode, the lode is 15 in. wide, with more ore than when last taken down. In the 100 fm. level east, on same lode, the lode is 18 in. wide, with a more promising appearance than when last taken down, worth 4*l.* per fm. In the 85 fm. cross-cut south the ground is very favourable for driving, and we hope in another month to cut the south lode. In the 12 fm. level, west of Quarry shaft, on Tolcarne tin lode, the lode is 15 in. wide, and worth 12*l.* per fm.; in the 12 fm. level, west of old sump shaft, on same lode, the lode is 9 in. wide, worth 4*l.* per fm.; in the winze, in the bottom of the 12 fm. level, west of Quarry shaft, on same lode, the lode is 2 ft. wide, worth 30*l.* per fm.; in the winze, east of Quarry shaft, on same lode, the lode is worth 12*l.* per fm. In the winze, in the bottom of deep adit, west of Quarry shaft, on same lode, the lode is 20 in. wide, worth 20*l.* per fm.—R. Johns: Nov. 23.

WEST WHEAL MARIA.—The eastern whim-shaft, is down the depth of 26 fms. 3 ft.; the lode in the shaft is about 6 ft. wide, producing good stones of ore. We have dropped the lift in the engine-shaft, this day, to the 34 fm. level.—T. Rodda: Nov. 24.

WHEAL ADAMS.—The 50 fm. level, driving south on the Gastorn lode, is a little improved; we expect to meet with the dip of the bunch gone down in the bottom of the 40 at the point of horse. We have cut a lot of water in the end, which makes us think we are approaching the 50 fm. level. Driving south, the western silver-lead lode is not looking so well as last week for lead, but more brown jack in it. The rise, in the back of the 50 fm. level, on the western silver-lead lode, is much the same as last week. The 40 fm. level, driving north on the western silver-lead lode, is not looking so well for lead—there is a quantity of brown jack in the lode; the tribute pitches, in the back of the 40, on the western lode, working at 2s. 6d. in the 1*l.*—much the same as last week, the tributers are mostly getting wages. Since last week we have cut a very good branch of lead in the 28 fm. level, on the eastern lode, about 35 fms. south of the old engine-shaft; we set a pitch on tribute at 12s. in the 1*l.*, and 15s. per fm., to cut the lode—we find this will encourage the tributers to try whole ground, and to lay open the mine—they have driven a little more than 3 fms. to cut this lode; we had two objects in view—to cut the lode, and to open tribute ground, and for air. We have now to drive south on the lode from the cross-cut, about 4 fms., to hole to the old level, where we have copper. We have two more tributers down about 7 fms. under the 28 fm. level in the old engine-shaft, driving to cut the eastern lode, at 12s. in the 1*l.*, and 20s. per fm.; if we cut a good here it will be an important thing for the mine. We have found the silver lead lode branches on the 18 fm. cross-cut. We set the slimes last week to a man and two boys to dress, at 12s. in the 1*l.* We think we shall be able to dress for the market this month about 20 tons of lead, and about 100 tons of brown jack, and could do more, if our dressing floors were larger; we are making new floors, which we hope to complete in a few days.—T. Moyle.

WHEAL CONCORD.—Since my last there is no material alteration in any of our levels, or other places, then mentioned. Where we have begun to explore the back of the 28 fms. levels, a little west from the engine-shaft, the lode is 2½ feet wide; and although not rich at present, there will be some returns made from it. We have discovered, in the back of the 20, about 20 fms. east from the engine-shaft, a lode from 1 to 2 ft. wide, from which we are saving good work, and report says there is a good lode beyond us. Upon the whole, our prospects may be considered favourable; and I shall continue to exert myself to develope the resources of the mine in the most economical and judicious manner.—J. B. Clymo: Nov. 21.

WHEAL LOUISA.—The engine-shaft is down 19 fms. 2 ft., the ground through which we are sinking is much the same as last reported; in the adit end south, the ground through which we are driving, is still looking well; we are progressing favourably.—J. Chynoweth: Nov. 24.

WHEAL NORRIS.—I beg to inform you, that we have continued working on the main lode in the 35 fm. level, which has improved far beyond our utmost expectations; it having now become an extremely fine lode of copper, computed worth from 30*l.* to 40*l.* per fm. It looks very healthy, and I shall give you more particulars next week.—J. Clymo.

WHEAL FRANCES.—In the 40 fm. level, west of new shaft, worth about 40*l.* per fm. In the 50 fm. level, worth from 25*l.* to 30*l.* per fm. In the 94 fm. leyel east, worth 5*l.* per fm. In the 82 fm. level, worth about 5*l.* per fm. In the back of the 50 fm. level, set at 45s. per fm., worth 150*l.* per fm. In the back of the 40 fm. level, set at a tribute of 1s.—Nov. 10.

WHEAL TRELAWNEY.—The lode in the 42 fm. level, north of the shaft, is 4 ft. wide, and worth 18*l.* per fm.; in the same level south it is 2½ ft. wide, and worth 20*l.* per fm. The lode in the 32 fm. level south is 2½ ft. wide, and worth 25*l.* per fm.; in the same level north it is very much improved since the last report, being now 2½ ft. wide, and worth 16*l.* per fm. The lode in the 22 fm. level north is suspended, being near the boundary of the sett; the lode in the winze sinking under this level is 2 ft. wide, and worth 12*l.* per fm. The lode in the 12 fm. level north is 3½ ft. wide, and worth 8*l.* per fm. Trelawney shaft is 29 fms. below the surface, in very favourable ground. We are also progressing very satisfactorily with our 22 fm. cross-cut, and hope to communicate with the above shaft in about three weeks. Our engineers are getting on very well with heaving in the engine. We sampled, on Friday last, a parcel of ore, computed 121 tons.—P. Clymo, Jun.: Nov. 24.

FOREIGN MINES.

NATIONAL BRAZILIAN MINES.—*Cocaes, Nov.* 23.—I informed you, in my last report, that I had placed some hands to commence sinking on the jacotinga in the bottom of the cross-cut, at the foot of Terril's winze, or the cross-cut marked C C, in the small plan: we have sunk at the place in question about 8 ft.; and I have no doubt but the samples, which I have handed you (the commissioner) from the jacotinga during the past week, will be exceedingly encouraging to all interested.—J. Hitchins.

ST. JOHN DEL REY.—*Morro Velho, Sept.* 8.—Of the Morro Velho produce, 11,086 oits. are from 2877 tons of ore, equal to 3·852 oits. per ton; and 137 are from the old coffers of the Lyons' stamps. The standard appears very low, which is attributed to the large quantity of killas broken in the Middle and West Cachoeira. Considering the stoppage of 15 heads of the Lyons' stamps during 10 full days, and other 15 heads during at least one day, in order to facilitate the repair, the quantity of ore stamped must be considered large. Mr. Smith estimates that, since the new 15 heads have been at work, the whole 30 heads have stamped 16 per cent. more than usual—that is, the new heads have improved their work 32 per cent. The pillar in the United Mines is complete, and the report shows that very fair progress has been made with the works in hand. A pillar is now commenced between the Middle and West Cachoeira, which will take some months to complete. Now, that the repairs to the Lyons' stamps are complete, the principal works during the next 12 months will be for the mine—first, the pumping and hauling machine for the Cachoeira, and then the 40 ft. pumping wheel; these things will occupy, with other works falling in, nearly 12 months. If they succeed in making the hauling wheel haul the ore to grass as well as pump, the heavy expenditure, on account of whim animals, will be entirely cut off, and ease us evidently in management. Cost for August, rs. 28,393 131 = 3159*l.*

Sept. 18.—Heads working during 18 days, 69·06; the supply of ore has been well maintained during nearly the whole of the month.

Craig-Ddu Slate Company.—The slate quarry, for the working of which this company has been formed, is situated at Festinoig, in Merionethshire; the lease extending over 205 acres of land, at the merely nominal rental of 80*l.* per annum, and a royalty of one-tenth on the slates raised. The vein has been traced in breadth for 400 yards, and is probably much wider; the over burthen is unusually light—good slabs being obtained at 20 ft. from surface, and splitting slates a little below. There is water-power at hand; and from the peculiar situation of the quarry, with proper management, it cannot be flooded: there are good roads to the shipping port, seven miles distance: a railroad is constructing within two miles; an engine and machinery of great power, with 6000 ft. of railroad, office, three cottages, and every necessary appliances, already on the premises, have been obtained on advantageous terms,—and the company will thus be enabled to commence profitable working, while the necessary additional buildings are being erected. The capital is proposed to be 150,000*l.*; but it is estimated that only, at most, two-fifths of this sum will be required to bring the quarry into a high state of production. The slate of this quarry is said to be equal to any in Wales; and considering, as we have on previous occasions remarked, that the supply of good slate is at present totally inadequate to the demand—for the numerous uses to which it has, within the last few years, been, for the first time, applied, particularly in the beautiful and perfect resemblance to the finest marbles which can be imparted to it,—and its consequent employment in the most elegant ornamental works, for the drawing-room, &c.,—besides an extensive variety of domestic uses, too numerous to mention—it is pretty certain that, carried out with spirit and judicious economy, these works will prove highly profitable to those who embark their capital in them.

Wheal Curtis.—The promoters of this undertaking, though perfectly well satisfied themselves of the promising nature of the mine from previous reports, extracts from which we have given on former occasions—determined on obtaining an additional one from an experinced and impartial agent, and, accordingly, authorised Capt. Richards to inspect the mine, and report thereon. The following are his remarks:—I now find that an engine-house is being built for a 70-in. cylinder engine, and also that a new engine-shaft is being sunk to cut Wheal Curtis lode, at the 90 fm. level; and that all other buildings are in a forward state, or nearly completed; and that Crase's shaft is cutting down to drain the old mine by a rod from the engine, until the new engine-shaft is sunk to a proper depth to do so: I think all this very proper, and judiciously laid out; and that the agents have adopted a very prudent step, in purchasing the materials from the sales that may offer at other mines, which may be required to put this mine in a proper state of working, by which a considerable saving will be effected. In conclusion, I have to observe, that this mine is situated in a good mining district, and is well worthy the attention of capitalists who might be disposed to speculate in Cornish mines.

[FROM CORRESPONDENTS.]

Birch Tor.—The 50 fm. level east is just as it has been for the last 10 days, a good course of ore. The 62 fm. level, in the bottom, is worth 12*l.* per fathom for driving, and is the best looking lode which has been seen in the mine, improving in quality every foot driven.

Condurrow.—A considerable improvement has taken place in the bottom level, going east on the old lode, which is composed principally of rich grey ore; and in the winze, sinking from the deep adit to the 10 fm. level, there is a rich lode of yellow ore on the Llandower lode. These discoveries have caused an inquiry for shares at advanced prices.

East Wheal Kitty.—The lode is at present poor in the end, but we have commenced sinking a winze on a promising bunch of copper ore, about 8 or 9 fms. from the present end, and we hope something encouraging will result.

Great Resugga.—Considerable speculation has taken place in this mine, and the price of shares has experienced the consequent fluctuation: the sett, as we are informed is generally considered a promising undertaking; and we should be glad to receive a detailed report, from the agent, of the present state of her workings.

Plymouth Wheal Yeoland.—The lode here has much improved with the last few days—the same being now estimated worth 20*l.* per fm. for tin.

South Harvannah.—The operations in this mine, which were all but discontinued during the summer and autumn months, for want of water, have lately been renewed with increased vigour, and with most flattering results to the shareholders. In the middle of last month a lode, 3 ft. wide, was discovered in the 10 fm. level, producing tin of the very highest quality, in which they are now driving. In a few days the water will be forked to the 20 fm. level, where, there is no doubt, the same will be discovered, and, it is hoped and believed, of still greater value. From the eastern stopes a considerable quantity of rich stuff is being taken—so valuable, indeed, that the men put it in bags before bringing it to the surface. Although defraying the expenses of last month, 60*l.* were paid into the Devonport Bank to the credit of the mine: altogether it has never looked so well; and, in a few months, a sum will be in hand, either to pay a dividend, or to purchase a steam-engine. The present spirited committee of management deserve much at the hands of the shareholders, as much of the success is attributable to them; their last act has been to direct their solicitor to proceed against all whose cails are not paid up—if this were done, there would be a considerable sum in hand.

Wheal Franco.—The next general meeting will be held in about three weeks, when it is presumed, that the accounts will show a profit of from 100*l.* to 150*l.*, which will be shortly after increased by returns from the old halvans, &c., from the adoption of Brunton's patent frames, and a decrease of surface cost, to the extent of from 40*l.* to 50*l.* per month.

Wheal Calstock.—This mine bids fair to do much; there are several branches containing ore of an excellent quality, running into a large gossan lode, which stands about 2 fms. to the south of the end of the cross-cut in the shallow adit, which is 24 fms. from the surface.

Wheal Trehane.—The shaft is now completed to the 30 fm. level, the lode here, as well as in the winze, in course of sinking from the 20 to the 30, producing good stones of lead; they have also commenced driving both north and south on a good lode; the north end of the 20 fm. level, now driving, has been for some time poor, but has much improved, being further from the slide, which was passed through in driving; the lode in the bottom level is nearly perpendicular, having scarcely any underlie—consequently, they will have a greater depth of the lode in the sett than was at first calculated. They are also in course of conveying the ores to the waterside, preparatory to sampling next week, when they calculate on selling 30 tons.

Great Swanpool Mine.—A company is about being formed, to resume the working of this mine, situate about a mile from Falmouth, in the parish of Budock. The prospectus represents the mine as "full of mineral productions"—lead, silver, tin, copper, iron pyrites, and zinc. About 50 years ago, large quantities of lead, very rich, were brought to surface. It is estimated that a

capital of 3840*l.* will be fully sufficient to carry out every operation required to bring the mine into a prosperous state. A meeting of parties interested in it, took place, at Lenderyon's Kings' Arms, when a provisional committee was formed, and immediate measures will be taken to bring the matter more immediately before the public. A working of this description in the neighbourhood of the town, would tend materially to relieve the burdens of it, and all the adjoining parishes; and we sincerely trust that the proprietors will meet with that encouragement to which their spirited exertions entitle them, and which, from the surveys which have been made at various periods, appear likely. The mine has never as yet been worked with efficient machinery, and, therefore, a fair trial has not been given.—*Cornwall Gazette.*

ASTURIAN MINING COMPANY.

A special general meeting of the shareholders in this company was held at the offices of the company, Austinfriars, on Monday, the 23d inst.,

GIDEON COLQUHOUN, Esq., in the chair.

The advertisement and circular convening the meeting having been read, the following report of the directors, with extracts from the correspondence of Mr. J. Manby, the superintendent of the company in the Asturias, and the balance-sheet, were submitted to the meeting.

REPORT.

The objects in view in calling this special meeting are so clearly stated in the advertisement, that few remarks will be necessary in further explanation. The reports, which will now be read, are of so much importance, that it was an act of justice to the shareholders, as well as the directors, to submit the whole for their information. It will be recollected that, in a previous report, dated June, 1845, it was stated that Capt. Matthews had valued the Cinnabar ore exposed at 4000*l.* This was so much sneered at and disputed, that your directors did not venture to lay out your money in ascertaining the fact: for this neglect they now blame themselves. It was not till Capt. Matthews was about to retire from the service of the company (having finished his engagement), that he requested, in justice to himself, that M. Paillette, a well-known mineralogist, and the inspector of mines, should be called in with our superintendent, Mr. J. Manby, to inspect and report on the value of the ore in store, and of the mine itself. Our superintendent was thus unwillingly convinced of the real importance of our possessions. The opinions expressed by Capt. Matthews (who is now in the room, and ready to answer any question that may be put to him) are, the directors have much satisfaction in stating, fully supported by corroborative testimony. Making every allowance for the sanguine hopes which have dictated the above reports, in regard to the future produce, it is clear that we have got a stock of cinnabar of considerable value—far more than sufficient to compensate for the time and expenditure hitherto consumed in prosecuting the several operations of the company; and we may expect, by June next, to be able to announce a handsome dividend to the shareholders from this source alone, independent of the produce of Santo Firmé Colliery, our coke contract, and the iron-works: from this latter we cannot expect much for the first six months; but when we consider that we shall be able to make iron cheaper than can be produced in England, and that the current local price is more than double, it cannot be doubted that a large profit will be obtained. We are now paying 25*l.* a ton for assorted iron, for our own purposes there, to complete the works. We have sent out retorts and fire-bricks, to enable Mr. Manby to erect the necessary apparatus for distilling the mercury. The total expense of this will not be above 600*l.*, and the apparatus will be available for the future produce of the mine.

The cost of this mine, up to the present day, is exactly 2700*l.*, including the price paid for the concession; and, from the reports received by the directors, we may hereafter hope that the expense of working it may be reduced, with reference to the value of the produce extracted from it.

It has been a subject of discussion at the board, how the Cinnabar Mine can be worked most to the advantage of the company. There can be no doubt, with the prospects held out, as well as the results which have been already realised, that the best plan would be, to work the mine with energy, although a handsome sum might be obtained for its disposal, which, however, in the opinion of the directors, would not be a politic course. We trust, if the result of the first year's distillation of the ore from the mine enable us to pay a dividend of 20 per cent. on the full amount paid up, for the prosecution of the several works, the directors will be encouraged to proceed, with every regard to that spirit of economy which they have heretofore exercised. It has been suggested, that a separate company might be embodied, to work this mine—the price to be paid, in paid-up shares, to be divided amongst the shareholders in this company, in proportion to the number of the shares held by them, reserving also to them the option of taking shares in the new company. If this scheme could be carried out, it would, no doubt, enhance the value of the shares in this company; but the state of the money market at present is unfavourable for any new company to start.

In regard to the iron-works, it is satisfactory to know that the principal expense is incurred, and that a dividend may safely be expected therefrom. The blast-engine was tried, and found to work admirably; the blast-furnace will be in operation in the present month.

The last point to be laid before the meeting, is the disposal of the shares which remain unappropriated. It was a matter of some doubt, whether the regulations of the Commercial Code of Spain admitted of a sale of these at less than par; and, in order to clear up this doubt, we directed our superintendent to take the opinion of a Spanish lawyer. This we now lay before the meeting, and it satisfies us that they may be sold at the market price. This would, no doubt, relieve the directors of considerable responsibility; but, on the other hand, it would have a bad effect, were so many shares forced on the market: many of our largest shareholders strongly recommend, therefore, that all the said shares should be cancelled, and the total number reduced from 15,000 to 11,400. This would add one-fourth to the value of the present shares, as it would increase the dividend to be expected next year upon each share. This is a very important question, and the decision on it must depend upon the financial position of the company.

The list of shares upon which the last call has not been paid is now on the table. It is larger than we expected; but we have no doubt that the greater part will be paid up in time to avoid forfeiture, which is always most unwillingly resorted to. But it is a duty we owe to the large proportion of our shareholders, to take care that all contribute equally to the success of the undertaking. If those who do not pay the calls are to share equally with those who do, the consequence will be, that few will attend to the call.

Balance-Sheet.

Dr.—Capital paid up		£63,085	10	4	
Loans		11,772	10	3	
Sundries		30	10	11—	£74,888 11 6
Cr.—Expenses in forming the company		£ 1,440	17	8	
Railway to the coast—surveys, &c.		2,495	19	9	
Purchase of Santo Firmé Colliery		8,980	4	5	
Eugenia Cinnabar—cost and working		2,700	0	0	
Works (iron) and machinery		51,766	8	3	
Expenses in London		2,285	7	8—	£69,668 17 9
Shares purchased		£ 320	0	0	
Debts due the company		1,616	13	0	
Office furniture		162	6	8	
Cash at bankers		3,120	14	1—	5,219 13 9
Total					£74,888 11 6

From a statement drawn up by Capt. Matthews, confirmed by the reports of M. Paillette, and the Government Inspector of Mines, of the produce of ore (cinnabar) raised up to the present time, it appeared that the total quantity was 5584 quintals, yielding, in the aggregate, 587½ quintals of mercury, or, on the average, about 9½ produce, which, valued at $82 per quintal—the present price of mercury in Spain—would give 9471*l.* The following is a list of the several parcels, and the produce of each:—

Quintals of Ore.	*Produce.*	*Quintals of Mercury.*
365	11 p. cent.	40
4576	4 „	183
327	63 „	206
54	40 „	21
54	9 „	5
111	52 „	57½
97	77 „	74½
5584	Average 9½ „	587½

The samples were taken in presence of M. Paillette and Mr. J. Manby, at the instance of Capt. Matthews, and transmitted to the directors, with the view of confirming the statements made by that gentleman of the value of the ore raised.

From the statements made to the meeting by Capt. Matthews, it would appear that the ore in sight, and which has been explored in the course of the workings, and remaining untouched, is equal to five times the quantity raised—thus giving a produce equal to 47,000*l.* It should, however, be observed that Mr. Manby *estimates* the ore raised at 6 per cent. average produce, or 5000*l.*, and calculates that some 12,000*l.* or 15,000*l.* worth has been discovered. M. Paillette's estimate is 10 per cent.—which, taking the value of the ore at 1434 rs. 13 m. per quintal, would give about 8000*l.* The opinion of M. P. is, in a great measure, confirmatory of that entertained by Capt. Matthews, as regards the ore discovered, which he sets down as from four to five times the quantity raised; while the Government inspector entertains a more sanguine opinion.

From the correspondence of Mr. J. Manby, C.E., read to the meeting, it appeared that the opinions formed by that gentleman, on subject of the Eugenia (cinnabar) Mine, had undergone a complete change; for, while he doubted the outlay (2700*l.*) ever being returned, and had, indeed, considered such as an actual loss incurred by the company, he, in his late correspondence (the last advices being under date the 8th inst.), however, admits not only that he erred in judgment, but that the ore raised was worth, at least, 5000*l.*, and that 12,000*l.* to 15,000*l.* had been laid open; while he impresses on the directors the importance of sending out retorts, and other appliances, so as to reduce the ore—the cost of which he estimates at 500*l.* to 600*l.*, whereby the ore now at surface may be converted—the proceeds of which would be available for a dividend, to be declared at the next annual meeting; from which source alone could any be calculated upon, inasmuch that, although the blast furnace for smelting iron would be in operation in the course of a month, yet it would require some time to elapse ere profits would be realised, or could be fairly expected. With reference to the prices at which materials could be furnished to the works, it appeared that the cost of iron ore was 5s. per ton; limestone, 2s. per ton; and coke, 3s. to 4s. per ton. As respected the question which had been submitted for the opinion of counsel in Spain, it appeared that the opinion there entertained was at variance with that held by the English barristers, inasmuch that it was considered legal to dispose of the unappropriated shares at a diminished price, should the company think fit to do so.

The correspondence, of which the above is a brief epitome, with the report and accounts, having been read,—the CHAIRMAN congratulated the shareholders on the accession to the value of the property possessed by them—in the results and prospects held out by the Eugenia Mine. It was true, as the report indeed stated, that the directors had been somewhat lukewarm, and had not acted with that energy and spirit, which the report of their agent (Capt. Matthews) could have warranted them in doing, who, so late back as June, 1845, had valued the ores in sight at 4000*l.*,—but, with the opinion expressed by Mr. Manby, their superintendent, the directors deemed it expedient to husband their resources, or rather apply them to the iron-works. The result, however, although the end might have been delayed, was highly gratifying, and must be hailed with satisfaction by all interested, as it held out the prospect of an early dividend, at the same time that a valuable property had been secured at a comparatively trifling outlay,—the whole amount expended on this portion of the company's property being only 2700*l.*; while, as the meeting had heard, the value of the ore already raised was estimated at upwards of 9000*l.* He might observe, *en passant*, that the ore met with a ready sale at a fixed price, which, at the present moment, was $82 per quintal—the Government taking the mercury as it was reduced. There could be no question as to the value to be attached to the property—indeed, Mr. Castlemain, the Government inspector, had pronounced it as his opinion that it was second only to the mines of Almaden. There were two questions before the proprietors, who had been specially called together to receive these cheering statements, to which he begged to draw their particular attention—the one was, providing funds for the progressive operations of the company; and the other that of considering the course to be pursued with the shares in arrear of payment of calls. As regarded the latter, he must confess that he entertained no doubts but that they would be all paid up on notice being given of their proposed forfeiture. As related to the railway, the arrangements contemplated with Mr. Busenthall had not been carried out; but such might be again subject of treaty, or the directors might enter into terms with other parties. From a statement subsequently made, it appeared, that no royalty on the quicksilver ores was payable to Government. With reference to the coal tracts possessed by the company, the CHAIRMAN further stated, that the Peninsular and Oriental Steam Navigation Company, with others, would readily take it—while the Government would also take a large quantity of coke.

Mr. SCALE, in observing on the coal-fields possessed by the company, stated that, if a railway was constructed to the coast, he had no hesitation in saying, that the company could not only compete with English coal, but would beat them out of the market on the continent to the south. The coal was of a superior quality for the purposes of coke, which latter could be produced at 4s. to 5s. per ton. The distance from the colliery to the coast was 37 miles, which was the great drawback. As much as 30s. per ton was paid for coal in the south of Spain, which was raised by the company at a cost not exceeding 2s. 6d. per ton. An offer had been made to lease Santo Firmé Colliery at 2000*l.* per annum, but which was, of course, disregarded by the directors.

Mr. KNILL (a director) expressed his perfect confidence in the undertaking, and the prospects held out of a dividend being declared at their next annual meeting. The specimens of ore that day submitted, must be highly satisfactory of the rich produce yielded by the mine—while the estimates submitted to them, and the information conveyed by Capt. Matthews, left not a doubt on the mind of the directors of the value of the property they had secured at so comparatively low a cost in bringing it to its present state.—A desultory conversation ensued, in the course of which Mr. Heming, Capt. O. H. Matthews, and others, took part, when the several resolutions, which will be found in our advertising columns, having been passed, and thanks voted to the chairman, the meeting adjourned.

TRETOIL MINING COMPANY.

The quarterly meeting of the adventurers was held at the offices, in George-yard, Lombard-street, on Thursday last, the 26th inst.

R. THOMAS, Esq., in the chair.

Mr. HENRY THOMAS (the secretary) read the advertisement convening the meeting, and the minutes of the last meeting, which were confirmed; he then read the following— REPORT.

The directors beg to submit the following report from the mine, which gives full particulars respecting the operations; and it is matter of regret to them, that it is not yet in their power to report so satisfactory a progress as was expected:—

AGENT'S REPORT.

Tretoil, Nov. 21.—Since the last meeting, on the 25th August, we have not made that progress in sinking Henwood's shaft which we expected; the ground has been more hard than formerly, and our operations have been somewhat retarded, in consequence of the bursting of the tube of one of the boilers, which has been reported. The shaft is now down 11 fms. 2 ft. below the 70 fm. level; we have finished casing and dividing, and commenced cutting plat, driving, &c., preparatory to sinking below that level; the lode in the shaft is 15 in. wide, producing some ore, but not rich; the ground is not so hard, and our speed in sinking will much increase; we have to drive east at this level about 8 fms., before we get under the ore ground gone down in the bottom of the 70; it cannot be done at present until the bottom level drains the water. We have suspended the 70 west for some time past, in consequence of its being poor; it is a sufficient distance from Henwood's shaft to ventilate the 80 for several months, and can be driven again when needed. In the 60 west, the lode has been small and poor for several fms. The 70 east, which we are driving as fast as possible, has been a productive level for the last 15 fms.; the lode at present is 15 in. wide, opening ground that will set at a moderate tribute; this end is near the cross-course, and we have every reason to expect a good level here; there is a rise going up in the back of this level, near the end, which is nearly holed to a winze coming down from the 60; the lode in the rise has been orey throughout, that in the winze unproductive. In the 50 east, the lode is about 1 ft. wide, composed of mundic, and some grey ore: this end is going on by two men, consequently the progress is not great; it is about 25 fms. west of East Tretoil, in which mine there to scarcely any thing done under the 16 fm. level, which is about 10 fms. under our adit. Johns's lode, going east from the new engine-shaft, remains much as from its commencement—15 in. wide, occasionally yielding good stones of yellow ore, but not sufficient to pay for working; an improvement in this end, of a satisfactory nature, has been expected for some time; it may be fairly expected to improve as it gets near the cross-course, which is distant about 20 fms.—there is no level on this lode except the present one. We are pushing the 40 cross-cut as fast as possible; the ground in this level has been hard lately—it appears at present improved; there are about 11 or 12 fms. more to reach the Mine Park lode, if it keeps its underlie, as seen at the adit level, which we cannot calculate on doing sooner than the end of February, 1847, and we hope ere that to have improvements in other parts of the mine.

H. WILLIAMS.

With respect to the statement of accounts, it will be seen that, out of the sum due on the sixth instalment, at the time of the last meeting, 410*l.* only has been received, leaving 251*l.* 10s. due thereon; and that, of the call of 5s. per share then made, 421*l.* only as yet had been paid—the amount due on this call being 659*l.* 10s.; and the disposable materials, East Tretoil engine, &c., estimated at 350*l.*, still remains unsold. With such a deficiency in the contemplated receipts, it has not been possible to reduce the liabilities; and, consequently, the creditors of the company are pressing much for the settlement of their respective claims, most of which are of long standing. It is obvious that, unless the calls are more promptly paid, continuance of the working the mine is impracticable, and the main object for which the present powerful machinery has been erected, and so much expense incurred, will remain unseen. The operations of the mine have been steadily directed to the important objects purposed—viz.: to cut the Mine Park lode, to deepen the workings on the Slide Park lode, and to prove Johns's lode—the result to this period being clearly pointed out in Capt. Williams's report. It will be necessary for the shareholders to give the affairs their serious consideration, and to determine accordingly.

From the statement of accounts, it appeared that the balance last account was 2263*l.* 1s. 7d.; cost for June, July, and August, 1463*l.* 7s. 6d.—together, 3726*l.* 9s. 1d. Ores sold, 714*l.* 11s.; calls, 831*l.*—1545*l.* 11s.: showing balance against the mine, 2180*l.* 18s. 1d.

The report and accounts were unanimously adopted.

The CHAIRMAN then said, that having submitted the above reports, and a statement of accounts, the principal business now before them was a consideration of the state of their finances, and the arrears of calls, which amounted to 921*l.* It was exceedingly unfair to those shareholders who paid their calls, that the working of the mine should be delayed, by parties refusing or neglecting to pay. It appeared that the directors were already responsible to a very large amount; large claims were now coming in upon them, and they had no funds to meet them. One large shareholder, in Cornwall, was in arrear 75*l.* 10s. on the last call, and 152*l.* 10s. on former calls—making 228*l.*; and although the directors had done all in their power to obtain payment, they could get no settlement; they had even drawn upon him, but he had not returned the bill; and this was the less excusable, as that gentleman knew the difficulties of a purser's duties, and the uncertainty and expense of mining. A list of the defaulters was laid on the table, and it appeared the unanimous wish of the meeting that coercive measures be immediately adopted to compel their payment.

After some conversation, in which Messrs. Cope, Lea, and Heall, joined a resolution was passed, empowering the directors to enforce the payment of the calls due, in any manner they may deem best for the interests of the company. It will be seen that, estimating the materials to be sold at 350*l.*, if the calls were paid up, the balance against the company, which appears above at 2180*l.* 18s. 1d., would be reduced to 909*l.* A call of 5s. per share was then made, having been proposed by Mr. Lea, and seconded by Mr. Heall; and a vote of thanks having been passed to the chairman, the meeting broke up.

CARADON MINING COMPANY.—A meeting of adventurers was held at Liskeard, on Wednesday, the 18th inst., when the following statement of accounts was presented and passed:—By 10th call, 2*l.* per share, 512*l.*; materials, not received, 29*l.* 5s.=541*l.* 5s. The arrears are, on 8th call, 4*l.*; 9th call, 17*l.*; 10th call, 126*l.*=147*l.*—To balance end of Aug., 33*l.* 8s. 4d.; labour cost, Sept., 158*l.* 17s. 9d.; ditto, October, 179*l.* 14s. 8d.; materials, 82*l.* 5s. 11d.=454*l.* 6s. 8d.; showing present balance in favour of the mine, 86*l.* 18s. 4d.—A call of 30s. per 256th share was made, payable immediately at the Devon and Cornwall Bank, Liskeard.—The following report, from Capt. Samuel Seccombe, was read to the meeting:—I beg to lay before you a report of the operations and prospects of this mine. The engine-shaft is sunk 6 fms. 5 ft. below the 35 fm. level. The sumpmen, since the last meeting, have been employed three weeks in making the necessary alterations in the pitwork, dividing shaft, putting in penthouse, ladders, &c. This has very much lessened the quantity of ground that would otherwise have been sunk; the cross-course appears to be getting more regular than it has been for several fathoms, and the ground is improving. The present price given for sinking is 24*l.* per fm.; but, from the improving appearance of the cross-course, it will be much less when the present contract expires, which is on the 27th inst. There are nine sumpmen employed; and, at the next setting, it is intended to put on three winze, or tackle, men, to facilitate, as much as possible, the sinking of the shaft to the 50 fm. level. The cross-cut, at the 35 fm. level, towards the south lodes, is driven about 12 fms.; and, according to the underlie of the next lode, where opened on near the surface, there is about 1 fm. more to drive in this cross-cut to intersect it. From the very promising character of this lode, where laid open by costeaning, I calculate it will be found productive at this depth—we have six men employed in driving this cross-cut, and the present price is 10*l.* per fm. On the lode intersected on the south side of the shaft, at the 35 fm. level, we have driven west 23 fms., which has been found to be of the most promising character, and intermixed with copper ore the whole length driven—some portion saving work. The lode in the present end is 3 ft. wide, 2 ft. of which is chiefly peach, and 1 ft. is composed of prian, soft spar, and copper ore, saving work. I expect to intersect another cross-course in this end shortly; six men are employed driving; the ground is favourable, the present price being 3*l.* 15s. per fm. A 35 fm. level has been driven east on the north lode 8 fms. 3 ft., 7 fms. of which contain very promising indications, and has produced some good saving work for copper. Judging from the general character of the lode in this level, I believe we are just at the upper part of a course of copper ore. To prove this, at an earlier date than it can possibly be done by a cross-cut from the engine-shaft, at the 50 fm. level, I intend to sink a winze on the course of the lode, which, I calculate, can be done without much difficulty from any influx of water. The lode in the present end is small, being disordered by an elvan course; six men are employed in driving: the price given is 7*l.* per fm. The adit is not yet communicated with the engine-shaft, but we calculate on doing so in about three weeks from this time—there being now 3 fms. 2 ft. more to drive to make this communication, which is very much needed to ventilate the mine. The floors are in course of making for dressing, and we are preparing ore for the market: we have several tons of good ore already at surface.

TRESAVEAN.—At a two-monthly meeting, held at the mine, on the 24th inst., the statement of accounts was examined and passed. The labour cost for Sept. and Oct. was 380*l.* 15s. 1d.; bills, 114*l.* 1s. 5d.: together 494*l.* 16s. 6.—Ores sold, less dues, 779*l.* 11s.; West Tretheham adventurers, 187*l.* 10s. 10d.—together, 967*l.* 1s. 10d.: showing profit of 472*l.* 5s. 4d., to which add balance of last account, 660*l.* 4s. 11d., gives balance of 1132*l.* 10s. 3d., from which deduct dividend of 5*l.* per 120th share, leaves balance of 532*l.* 10s. 3d.

WHEAL ANDREW AND NANGILES.—At a two-monthly meeting, held on the 16th inst., the statement of accounts was examined and passed, from which it appeared, that the balance from last account was 525*l.* 10s. 10d.; cost for Sept. and Oct., 847*l.* 14s. 0d.; merchants' bills, 457*l.* 4s. 8d.: together, 1830*l.* 9s. 6d. Division of cost last account, 2*l.* 4s. 8d. per 1-235th share, 524*l.* 16s. 8d.; ores sold, 620*l.* 13s. 11d.: together, 1145*l.* 10s. 7d.—showing balance due purser, 684*l.* 18s. 11d.—It was resolved that a call of 3*l.* be made payable forthwith.

WHEAL ELIZABETH.—At a meeting of adventurers, held at the Mining Office, Tavistock, on the 20th Nov.—JOHN RUNDLE, Esq., in the chair,—It was resolved, that the workings of the mine be suspended until the arrears of the calls be paid up; and that the purser be instructed to take immediate steps to enforce the payment of all calls in arrear—such calls, when collected, to be paid into the Tavistock bank, of Messrs. Gill and Rundle.—The following report from Capt. G. Francis was read to the meeting:—The adit level was commenced in June last, 42 fms. from a lode, on which a shaft has been sunk 17 fms., producing ore more or less for that depth, the lode varying in size from 4 ft. to 6 ft.; there are now 26 fms. more to drive, and, when completed, would be about 17 fms. under the bottom of the shaft before named; the ground in the level has a mineral appearance, and at present can be driven for 50s. per fm. There has been a lode already discovered from 3 to 4 ft. big, which produced some good yellow copper ore, about 4 fms. from the surface. The meeting was then adjourned to Saturday, the 5th December, that the immediate resumption of the workings be then considered.

NORTH ROSKEAR.—At a meeting of adventurers, held on the 12th inst., a dividend of 5*l.* per share was declared. The cost for August and September, amounted to 470*l.* 13s. 4d.; the ores sold yielded 505*l.* 0s. 1d.: leaving a profit of 35*l.* 6s. 9d., to which add the balance of July account, 200*l.* 19s. 4d.; and deduct present dividend of 350*l.*—leaves balance in hand, 200*l.* 6s. 1d. The mine is not looking so well as it did, and no dividend will be declared next account.

WHEAL TREREW.—A meeting of adventurers was held at the mine on the 12th inst., at which the accounts were presented, showing balance due, at last meeting, to end of May, 133*l.* 6s. 5d.; for 20-in. cylinder steam-engine, 240*l.*; to costs, for June, July, Aug., Sept., and Oct., 254*l.* 14s. 6d.; to merchants' bills, for those months, 322*l.* 10s. 1d.=950*l.* 11s.—By call made Jan. 8, of 5*l.* per share, 640*l.*—less arrears, not received, 10*l.*: leaving mine in debt 320*l.* 11s. The accounts, having been examined, were allowed and passed, a call of 4*l.* per share was made, and the purser's salary increased to 4*l.* 4s. per month.—The captain reported to the meeting, that he, in conjunction with Mr. West (the engineer), had purchased and put to work a 20-inch cylinder steam-engine; he had also purchased a capstan, shears, whim, and a lift of pumps 13 fms. long; had sunk the shaft to the depth of 13 fms. 2 ft. from surface, and driven the cross cut west from engine-shaft 5 fms. 3 ft. On the morning of the meeting, the men cut a branch of lead in the cross-cut 3 in. wide, and expect, after driving the cross-cut about 2 fms. farther, to cut the lode.

MINE ACCIDENTS.

The Accident at Oldbury.—In another column we have given detailed particulars of the principal points respecting this awful calamity, adduced in the evidence before the coroner.

Explosion of Fire-damp near Preston.—A dreadful explosion, accompanied with a very serious loss of life, happened at the coal mine of Mr. J. Hargreaves, jun., at Easton Burgh, on Tuesday last. It appears, that about five o'clock, the time the miners were going to the mines, they, in the usual course, required from the fireman an assurance that the mine was in a fit state for them to enter; and on Tuesday, they were, as usual, going to their work in the mine—the fireman having first gone down, when, in a few minutes after they had entered, an explosion took place; and, melancholy to relate, eight of the poor fellows lost their lives. Some people attach blame to the fireman, who, it is stated, has not a proper knowledge of the nature of the works; whilst he, on his part, states that the men entered the works before he certified that the pit was safe for them to enter. The following is a list of the killed:—T. Halliwell, and his daughter Jane; S. and W. Turner, 23 and 25 years; W. Wilding, aged 16; Mary Booth, aged 12; Jane Moss, aged 25. Injured—J. Booth, dangerously; T. Graham, ditto; T. Farrimond; T. and J. Farrimond (his sons); R. Lomax. There were from 30 to 40 other miners in the pit at the time, in other directions, who were considerably alarmed by the shock of the explosion, and who were prevented for some time from coming into the neighbourhood of the mine, where the four sufferers were lying.

Rowley Regis.—D. Price was killed by a fall of coal in Messrs. Barr's Colliery.

Kirkby Ireleth.—R. Casson was killed by a fall of earth at Fisher Quarry.

Plymouth Pits, Merthyr.—J. Oats was killed by a stone falling on him.

Darlaston.—R. Cottrill was killed while working at Messrs. Addenbrook's.

Buddle Pit, Workington.—During the violence of a storm the rope used in hoisting the coals was two or three times blown out of the sheave plate, when, on one occasion, while the banks man (John Carr) was endeavouring to replace it, he was struck on the forehead and killed.

Joint Stock Pit, Coxhoe.—J. Wilkinson went to the flat sheets of the high main coal seam for the purpose of ascending; and an onsetter being in the act

of taking a tub out of a cage, ran against him, and knocked him through a hole in the battery, and he fell down the opposite shaft, a depth of about 10 fms.

Harvey's Coppell Colliery, Standish, Lancashire.—A dreadful explosion occurred here on Tuesday last, by which three men were killed, and several seriously injured. It appears that the man, whose business it was to renew the fires below early in the morning, had neglected doing so; in consequence of their going out, fire-damp accumulated—and, when he went down, at a later hour, to relight them, an explosion took place.

Hetton Colliery.—W. Gray was crushed while working in the East Minor pit.

Shocking Occurrence.—The accidents which occur in carrying on mining operations are as various in their character as they are sudden and appalling in their consequences. At the close of last week, an occurrence took place in a pit in the neighbourhood of Oldbury, which has placed the lives of two unfortunate men in the utmost peril. It appears, from all we can learn, that it is usual for a night gang to descend the pit, and work until relieved in the morning, by the regular hands. On the present occasion, two men descended the mine, and had not been long at work when a sudden fall of coal took place, which crushed the poor fellows in a frightful manner. Their cries for help were unheard; for the banksman, whose duty it is to attend during the day at the mouth of the shaft, had gone away, and the unfortunate miners were left to their fate. In this situation their sufferings, mental as well as bodily, must have been dreadful; for their was no hope of assistance until their fellow-workmen descended the pit the following morning, when the poor fellows were found in a deplorable state, and conveyed to their homes with little hopes of their recovery. The system of leaving men during the night so utterly unprotected and cut off from assistance in case of accident, should be altered, as such a practice cannot be justified on any principle of reason or humanity.—*Birming. Jour.*

LA JAHOTTIERE IRON COMPANY.

A special general meeting of the shareholders was held at 22, Throgmorton-street, on Thursday, the 26th inst., pursuant to advertisement.

BENJAMIN IFILL, Esq., in the chair.

The advertisement, convening the meeting, and the minutes of the committee, by virtue of which the same was summoned, in accordance with the provisions of the *Acte de Société*, having been read, the clause (15) in the Act, empowering a special general meeting of the shareholders, holding more than one-half the number of shares, to increase the capital on such terms as they might determine, was referred to; and, it appearing that more than two-thirds the interest of the company was present, or represented, the meeting proceeded to the business for which it had been called.

The CHAIRMAN observed that, it appearing from the representations made to the committee, under date the 27th ult., that it would be expedient to extend its operations by an influx of capital, by the issue of new shares, or such other modes as might be determined upon by the shareholders, the committee had called the present meeting. Mr. Lamie Murray, who was well informed on the several points of interest and importance in the consideration of the question, and who, moreover, had particularly directed his attention to the subject, would submit to the meeting the views entertained by the committee; and, at the same time, readily afford such explanations, or information, as to the nature of the company's affairs, and the prospects it presented, which might be required, and which, he doubted not, would be deemed highly satisfactory.

Mr. L. MURRAY observed, that certain resolutions had been drawn up, with the view to their adoption by the meeting; and, such having been read, it would afford him pleasure to enter into the subject fully, and to render to the proprietors present such information as he possessed.—The resolutions having been accordingly read, Mr. M. proceeded to observe, that in the establishment of the company, as in all similar instances, difficulties had interposed, which, however, he was happy to say, had been dispelled; and that the drawbacks met with had, on their being overcome, only convinced the directors that the value of their property was fully equal to their most sanguine expectations; while they only required additional capital to develope its resources, and derive those advantages which were apparent. The Act, by which the company was governed, authorised the extension of the capital; and the object of the present meeting was to determine the amount, and, furthermore, whether the results would justify such course: he, for one, had no hesitation in expressing his opinion most fully in favour of the accession of capital, and observing the most liberal terms—considering, as he did, after the outlay already incurred, that a further application of capital, to the extent of that already expended, would not only treble the make of iron, but quintuple the profits; and hence the advantage of admitting other capitalists with them, while each shareholder would have the option of taking additional shares, and thus increasing his interest, or otherwise.

M. DUPREZ begged to interrupt the speaker for a moment, to inquire whether the 15th article of the Act authorised the extension of capital, for the construction, or erection, of mills and forges, or was rather confined to the blast (*haut*) furnaces. A reference to the Act at once settled this in favour of the proposition, advanced by Mr. Murray, of applying the newly-raised capital to the extension of the works, and the manufacture of bar or rod-iron, sheet, &c., as might be henceforward determined upon.

Mr. L. MURRAY, in continuation, observed that the present capital might be considered as about 500,000 fr., or 20,000*l.*; while, to effect the desired object, it would require a further outlay of 20,000*l.*—thus making the entire capital of the company 40,000*l.*, or 1,000,000 fr. This increase, it was proposed by the resolutions submitted to the meeting, to create by the issue of new or additional shares, of 1000 fr., 500 fr., and 250 fr.—it being understood that the power of voting was confined to the scale laid down in their deed—viz.: 5 shares of 1000 francs, 1 vote; 20 shares, 2 votes; and 30 shares, 3 votes: thus, it would require a party to hold 20 shares, of 250 fr., to place him on an equal position with the holder of 5 shares of 1000 shares, and thus *pro rata*. There could be no doubt, but that the works would become of infinite importance, from the facilities afforded for the manufacture of pig and bar-iron, at a comparatively insignificant cost, as compared to that attendant on the introduction of English pig or bar-iron in France. He might observe that, in the prosecution of the affairs of the company, he had taken upon himself a heavy responsibility; but it was highly gratifying to him to be in a position, in which he could congratulate the proprietors, not only on the prospective returns which might be calculated from the works, but on the actual results at the present moment; as he had no hesitation in saying, that not only might the outlay incurred be realised, with a handsome surplus, but that the present operations, confined as they have been, would leave a profit of 30 to 40 per cent. on the manufacture. The cheapness and excellence of the ores were undoubted, and a reference to the weekly returns of the make and cost would render this demonstrable; the iron ore was most readily fusible, and was of a produce of 40 to 45 per cent.—only 2½ tons being required in the manufacture of a ton of iron, and which was rendered at 3½ fr. per ton; while the quantity of coal might be set down at 30 cwts. to the ton of pig-iron, but which was slightly exceeded with the present make. He might here observe that, in the first instance, nearly three times the quantity of coal was consumed, arising from the ill construction of the furnace, as affected the peculiar properties and richness of the iron ore to be treated; but this had been set right, and hence the reduction in the fuel consumed. It might also be remarked that, in the use of hot air, a considerable saving had been effected by the application of the gases, or heat, to raise the blast to the required point; breeze, or small coal, being only used as an adjunct. Some remarks had been made out of doors by parties, who evidently had not troubled themselves with the perusal of the prospectus, or an inspection of the accounts, and whose expressed opinions were calculated to mislead, without explanation being afforded. He should not occupy the time of the meeting by entering into any detail, as the accounts, and every information relative to the property, were available for reference, and would at once satisfy the most sceptical; while a comparison of the advantages, or disadvantages, could at once be arrived at. As regarded the manufactnre of iron in France, he believed he was correct in saying, that 7-10ths of the quantity smelted there was from charcoal; and it must be borne in mind that, with respect to the monopoly which prevails in France, and which had its natural influence on the affairs of the company, that such must exist, if that the Government would not render that country dependant on supplies from the only two countries in Europe who could render them—viz.: England and Belgium; at the same time, such a measure would destroy one important branch of their national industry—one it would be so difficult to re-establish, after it had been ruined and its elements scattered. However, other industries in France may be opened to free-trade hereafter—there must ever be, from obvious reasons, a protection on iron manufacture, equal to the difference of cost price in England, in Belgium, and France—or leave the latter country dependent, under every circumstance, for a supply of a primary article, either in France, or even on these two countries. There could be no question, but that iron might be smelted in France (La Jahottiere), and converted into pig-iron, or rough castings, at a price very considerably less than that of Welsh pig, or other iron, after paying freight, duty, &c., while, by the use of Welsh anthracite coal with the French ore, and availing themselves of cheapness of labour, vicinity to markets, &c., no doubt could exist of their returning large profits.

Mr. POCOCK observed, that he considered the resolutions proposed far too liberal: he, in common with other gentleman, had risked his capital; and although some time had elapsed ere returns were made, yet he ever entertained sanguine opinion as to the results. He, for one, although he should not oppose the resolutions read to the meeting, could not but express the opinion he entertained, that the course proposed—that of admitting the public at par—was an act of excessive liberality.

Mr. TABON agreed, in a great measure, with the last gentleman; but as it had been well observed by the chairman, and others who had addressed the meeting, the position of the company was that of a certain capital having been expended; and in holding out to the capitalist to embark in common with them, by an equal advance to that which they had made, they would, in fact, place themselves in a far more advantageous position, while the new shareholders would equally derive with them the profits arising from the active prosecution and further development of the works.

In the course of the discussion which ensued, prior to putting the resolutions to the vote, which in the end were unanimously carried, it appeared that the intention of the committee was the introduction of anthracite from South Wales, whereby the ore could be reduced with advantage, as had been proved by the experiments already made at the works: the comparative cost of pig-iron, smelted at La Jahotierre, and put in market, being 3*l.* 11s. 4d. per ton—while the cost in Wales, and added thereto the freight, insurance, duty, and other charges, would be 7*l.* 4s. 11d., or a difference of 3*l.* 13s. 7d. per ton.

A vote of thanks having been passed to T. L. Murray, Esq., and M. Duprez, and also to the chairman, the meeting adjourned.

GREAT WHEAL MARTHA MINING COMPANY.

TO THE EDITOR OF THE MINING JOURNAL.

SIR,—When I wrote you, a few days ago, respecting the Great Wheal Martha Mining Company, I did not intend my letter for insertion in your Journal, but merely for the purpose of drawing your attention to what I knew was an erroneous quotation in your share list; and I did this in furtherance of your own request to "correspondents in general," to furnish you with "such corrections in your share list as you may not have received through your usual channels of information." As, however, you did insert my letter in your paper on Saturday, I hope in justice you will give equal publicity to this, more particularly as you remark that "our correspondent is not a very attentive reader, or he could not have missed the agents' reports of this mine, which are inserted in each alternate Number. With respect to the disposal of his interest, we presume that he would find but little difficulty, on making application to any of the brokers, whose addresses appear in our front page." Now, in the first place, I beg to say, that my requesting information from you respecting these mines, only shews that I have given very great attention to the agents' reports to which you refer, for such ambiguous and meagre documents I never saw. It is almost my invariable custom to call at the office of the company, on the day on which the reports generally arrive, and there read them carefully over, some days before they appear in your Journal. I sometimes also ask information from the clerks, but they appear to know nothing about it; one thing in particular, I have been anxious to ascertain—and that is, what price is obtained for the ore which is raised from the mines. We see in the reports sometimes that so many tons are to be sampled, but we cannot learn its value, nor have I ever seen any notice of the sale at any of the mineral markets. I, therefore, thought, you might have some means of ascertaining from local correspondents, what were the real state of the mines; and I was induced, as much for the benefit of all the shareholders, as myself, to procure correct information on the subject. I shall be very much obliged, if you can prevail upon any of the brokers, "whose addresses appear on your front page," to buy my shares at anything like the price quoted in your list. I went, some time ago, to the broker recommended to me at the office of the company, as being the principal dealer in the shares, and I left him my name and address, that he might inform me if he could find a purchaser for my shares, but have heard nothing from him, although it is now six weeks or two months ago. I have mentioned them to several others, and they know nothing about them. I know one broker who holds a good many himself, and would be glad to sell them, but cannot.

London, Nov. 24. J. H. M.

[If our correspondent applies to the *secretary*, we have no doubt he, or any other shareholder, will receive information as to the sales of ore, and on any other points; the purchases of ore, we believe, have always been by Messrs. Williams, Foster, and Co. As to the captain's reports, they cannot be expected to be otherwise than meagre—the operations being now chiefly confined to sinking the new engine shaft (upon which a powerful steam-engine has recently been placed), with all vigour, to cut at the depth of 40 fms. under adit, the promising lodes opened on in the 10 and 20, in the eastern part of the sett. This work is progressing rapidly, and we know the opinion of mining agents as to the result is very favourable; but we dare say, our correspondent, if he wishes, can have an inspection of the mine by his own agent, by asking for an order, at the office, for that purpose. We believe the difficulty in finding buyers of shares is not cofined to Wheal Martha, but pretty general.]

SOUTH WHEAL MARIA MINE.

SIR,—Having several times noticed references made, through your columns, to the South Maria Mine, and considering it done for private purposes, without particularly interfering with the operations of the mine, I have allowed them to pass unnoticed. On seeing my name mentioned in an unwarranted manner, in your paper of last week, detailing circumstances (relative to the meeting of our adventurers, held on the 12th inst.) for one side of the truth, I am thus induced boldly to meet the author of that paragraph in his own way. He first states the meeting to be an extraordinary full one: nothing can be more untrue—for, out of 154 adventurers, only 18 were present. He next says, the agents recriminated each other: Why does not he tell the truth—viz.: that he, with some others, had long been endeavouring to sow the seeds of discord, in reference to the appointment of another captain (which, by some of the largest shareholders, was deemed necessary), and that he made one of the three who laboured so industriously to supplant the purser also—each being candidates for that office? The insertion of this did not answer his purpose—knowing it would appear as evidence, as to what was, and is, his object. On examining closely the spirit of his remarks, it is clearly perceptible that your informant writes like a disappointed man—like one who has made wreck and ruin of former speculation in business—one that has managed his affairs so well, as to manage it into the hands of other people; and, being now on the stream, seems to fancy the handling of the money of South Maria adventurers as their purser. In this attempt, it is equally clear, he has been foiled; and finding the large and respectable adventurers are not easily led away by his slander and sophistry, and being also pretty good judges as in whose hands they are most safe, my rival seems for the time driven from his post, and has recourse to newspaper publications, with a view to prejudice the minds of distant shareholders (if he can induce them to notice it), in order to try his luck again at another meeting. He next represents our chairman as weary of the proceedings, and pledging himself never to sit with the adventurers again. Here he insidiously stops short of an elucidation, which would have shown that it was the clamorous few, of which your informant made one, that the chairman denounced—whose conduct he deprecated, and whose company he wished to avoid. I ask, Sir, what less than unpleasantness can be expected at mining meetings, when men stand as shareholders who are not *bonâ fide* adventurers—who are at no risk of their own property, and are only named as shareholders by the *fictitious* transfer of shares from some friend, to give them a voice at meetings, in order to promote dissention, engender strife, and embrace every opportunity to raise and join a faction, with a view of elbowing their way to office—I say, while such is the practice, it will not be a matter of surprise to read such vindictive remarks as contained in the paragraph alluded to in your paper, as the most a mortified man can do. But remark, Sir, how distant Mr. Scribbler keeps from the general point of inquiry at such meetings—viz.: as to how the purser has discharged the duties of his office. Not a word is said about financial affairs—the name of a book is not so much as mentioned—no room seems to be found to say, that moneys are unaccounted for—that an alarming amount of back cost is uncollected. Not the least hint is given that the banking account is not right—that the purser has overdrawn large amounts for his own private speculations (which, in our part of the world, has been practised)—the whole of these things, being such important inquiries in general, seem to be counted by my rival as trivial matters. At any rate, he does not name them; and why? Why? because, like the sweets to the eye of coveting Reynard, they are being placed beyond his reach; yet, unlike that subtle animal, fears openly to speak evil of that which he knows to be good—therefore, sculks by them unnoticed. I hope the next time he scribbles, he will favour you with his name to his epistle, that I may enter the field boldly with him; if not, I shall think his remarks worth no further notice.

In conclusion, I am ready to answer any question, give any information, and render an account of my stewardship, to any *bonâ fide* shareholder, and at any time, touching the course I have pursued, since elected as the company's purser. Many attempts have been made, and are still making, to discourage the real adventurers, and stop the mine, with a view, I believe, of obtaining the sett. But, let not the shareholders heed such attempts: the company is good; the speculation, by the best of judges, is considered to be most promising; and, having many among us who are large adventurers, men of high standing, and thoroughly experienced in mining affairs, the distant shareholders have nothing to fear, as the mine has been, and will be, conducted under their sanction and general approbation; while the minutes of meetings (with which every shareholder will always be furnished), will always inform them whether, or not, the purser discharges with propriety the duties of the office he is intrusted with.—JOHN SECCOMBE, purser, South Maria: *Tavistock, Nov.* 25.

VICTORIA AND ALVIGGAN TIN MINES.

SIR,—In your Saturday's Number, I find several errors in Capt. Paull's reports of the Victoria tin mine, which I have no doubt have unintentionally arisen on his part, and which I am sure you will readily correct. He says, "on the south is Mineral Courb Mine and the Alvigency Mine." This is evidently meant to be the Alviggan tin mines, on Alviggan Moor, which are not, I am most happy to say, "suspended," but are working with a vigour and enterprise which will soon, I doubt not, convert "the considerable promise," Capt. Paull speaks of, into a most agreeable and *considerable* reality, as they are raising beautiful tinstuff from two lodes 4 and 8 ft. wide. As Capt. Paull's statement, if unnoticed, is likely to create groundless alarm among distant shareholders, I would beg insertion of this in your next Number. C. H. W.

Cheltenham, Nov. 23.

NEW SHARE & MONEY MARKET, ROYAL EXCHANGE, LONDON.

Shares are advertised free of charge, and only one party has to pay in each transaction. Parties wishing to purchase shares are not required to deposit the cash, but must give a satisfactory reference in London, and receipts sent by return of post for shares deposited.

TWENTY-FIFTH LIST.

SHARES for SALE THIS DAY, (offered by the owners as under:—The public can purchase any of these shares without paying commission).

Shares.		*Per Share.*
8	Buckinghamshire Scrip	at £3 3 0
40	Belfast and County Down	0 6 6
40	Ditto	0 5 6
30	Bristol and South Wales	0 5 0
20	Churnet and Blythe	1 17 6
45	Eastern Counties Perpetual 5 per cent., No. 2	7 3 4
56	Ditto	7 3 4
3	Eastern Counties York Extension	3 17 6
10	Great Leinster and Munster 7*l.* 10s. paid	3 10 0
30	Great Western of Bengal	0 10 6
40	Great North of India, at 5s. 6d., 35 at 6s., 30 at	0 6 6
30	Great Indian Peninsula	0 5 6
7	Great Western Fifths	30 10 0
60	Great Southern and Western of Ireland	29 10 0
20	Irish North Midland remanets	0 2 0
20	Leicester and Bedford, stamped	0 17 6
32	London and South Western, 40*l.*	49 0 0
50	Madras, Nellore, and Arcot	0 7 0
10	Manchester, Buxton, and Matlock	3 9 6
20	Neptune Marine Insurance	9 10 0
50	Oxford and Salisbury	0 8 0
20	Rugby, Derby, and Manchester, remanets	0 8 0
50	Southampton, Manchester, and Oxford Junction	0 6 0
35	Western Gas Light, 3*l.* paid	2 0 0
10	Ditto, 5*l.* paid	3 10 0

SHARES WANTED, THIS DAY.

(The public can supply any of these shares without paying commission).

Shares.		*Per Share.*
1	Aberdeen	at £19 0 0
100	Armagh, Coleraine, and Portrush	0 5 6
5	Asturian Mine, 8*l.* paid	3 10 0
100	Bandon and Bantry	0 6 0
100	Cornwall, at 17s. 6d., and 50	1 0 0
100	Ditto, Halves	0 7 6
10	Chester and Holyhead	25 0 0
10	Commercial Gas	5 7 6
50	Central of Spain	0 5 0
500	Essex and Suffolk, remanets, at 2s. 3d., and 500	0 2 0
1000	Exeter, Dorchester, and Weymouth, remanets	0 1 0
50	Great Indian Peninsular	0 3 0
7	Kent Waterworks	90 0 0
480	London and South Essex, remanets	0 2 9
30	London, Bristol, and South Wales Direct	1 0 6
25	London and South Western, 50*l.* paid	63 0 0
10	London, Salisbury, and Yeovil	1 7 5
100	Luxembourg, 4*l.* paid	0 12 6
10	Manchester and Southampton, 1847	1 7 6
2	North Staffordshire	5 9 6
50	Newry and Enniskillen, 7*l.* paid	0 10 0
500	Northumberland and Lancashire, remanets	0 2 6
75	Oxford, Witney, and Cheltenham	0 8 0
500	Rugby and Huntingdom, remanets	0 6 0
1	Reversionary Interest Society (King's Arms Yard)	100 0 0
250	Shrewsbury and Hereford, remanets	0 2 9
50	Ditto, and Herefordshire Scrip	0 12 6
15	Sambre and Meuse	4 10 0
25	Union Bank of London, at 11*l.* 5s., and 10 at	11 7 6
490	Worcester, Hereford, Ross, and Gloucester, remanets	0 2 6
50	Waterford, Wexford, Wicklow, and Dublin	0 6 0
50	Yorkshire and Glasgow Union	0 12 6
20	Worcester, Warwick, and Rugby	0 7 0

The public are particularly requested, in sending shares from the country, to enclose them in a registered letter, addressed to Stevens, Hansard, and Co., Transfer Office, 5, Royal Exchange.

Current Prices of Stocks, Shares, & Metals.

STOCK EXCHANGE, Saturday morning, Eleven o'clock.

Bank Stock, 7 per Cent., 206
3 per Cent. Reduced Ann., 93⅞
3 per Cent. Consols Ann., 95
3 per Cent. Annuities, —
3½ per Cent. Ann., 95⅛
Long Annuities, 9⅞
India Stock, 10½ per Cent., 256½
3 per Cent. Consols for Acc., 94⅞
Exchequer Bills, 1000*l.*, 8 11 8 pm.

Belgian Bonds, 4½ per Cent., 95
Dutch, 2½ per Cent., 59½
Brazilian, 5 per Cents., 84⅛
Chilian, 6 per Cents., 95
Mexican, 5 per Cents., 22
Spanish, 5 per Cents., 25⅛
Ditto Deferred, 16⅛
Portuguese, 4 per Cents., 37½
Russian, 5 per Cents., 111½

MINES.—The mining share market generally appears to maintain the quotations of last week, and, in some instances, the prices have advanced. The attention of capitalists is evidently directed towards this species of investment, and, assuredly, no period offers more satisfactory opportunities. The many dividend paying mines, the generally healthy and improving condition of others, together with the opening of new mineral districts, under the most auspicious circumstances combined, present opportunities to afford a tangible and legitimate security. Since our last, we learn that West Maria has improved, while Wheal Trelawney will considerably increase her sampling, and Trehane will shortly have her first parcel in the market, with a probability of a regular return. Advices of an improvement in Condurrow has also been received this day, which has created an inquiry for them. Lamherooes have likewise been in demand—buyers upon an advance of our last quotations. During the past week several purchases have taken place in foreign mining shares. We generally deprecate the expenditure of British capital in the exploring of foreign mines, which we have hitherto found to be ill-remunerative, yet we have some hopes that a few will now return a tithe portion of the immense sums which have been expended in their workings. In Bolanos, Altens, Real del Montes (scrip) and loan notes, and Asturian shares, have been done extensively, at present quotations—whilst sellers generally are seeking higher prices. Cobres Santiagos, and Copiapos, are extremely dull, still buyers are to be found at lower figures—consequently, but few bargains have been effected. From the Alten Mines the representations made are of the most gratifying character, which are at present worked at a profit—although, to efficiently and profitably work these extensive setts, a much larger capital is required. Business in the following home mines have been done—viz.: Franco, Lewis, West Wheal Maria, Fortescue, Lamberooe Wheal Maria, East Tamar, South Tamar, Tincroft, West Seton, Wheal Blencowe, Trewallack, Louisa, Pentuan, Wheal Mary, Trehane, Wheal Mary Ann, Kirkcudbright, Concord, East Crowndale, West Wheal Jewel, Condurrow, Alfred Consols, Trenow Consols, East Wheal Crofty, Herodsfoot, Bedford, West Providence, Gwinear Consols, Wheal Jane, Cubert.

RAILWAYS.—The share market has again been, during the early part of the week, in a very unsatisfactory state. Established lines, whose stock we have noticed, for some time past, as maintaining their figure, are very generally down; the great lines have been exceedingly dull, and the market has been very heavy. The two last days, however, a slight rally took place, and prices might be considered a trifle better, with somewhat more demand.

MEETINGS.—*Direct Sheffield and Macclesfield:* for dissolution; the meeting was found to be illegal—the notice having been printed "Sheffield and Manchester."—*Waterford and Kilkenny:* half-yearly meeting; 5½ miles of the line are nearly completed; a call of 3*l.* will be made in June next; the total receipts had been 90,875*l.* 11s. 11d., and balance in hand was 13,672*l.* 9s. 10d. The directors were authorised to raise money by loan, to the amount stated in the Act.—*Madrid and Valencia:* an adjourned special meeting, to hear counsel's opinion as to legality of paying off discontented shareholders; the opinion was adverse to such course—but, it was stated, some capitalists were prepared to make offers to those who chose to retire, and another meeting is to be called within six weeks.—*Manchester and Leeds:* special meeting, to make up additional number of directors, and authorise the raising of capital for the forming various proposed branches and extensions.

The Exeter and Crediton Railway is expected to open on the 22d December.—On Friday morning last, the early railway train between Kendal and Lancaster ran over and killed a fine black cat, which was crossing the line with a mouse, and was too intent upon her prey to notice the approach of the engine. The cat was afterwards found completely cut in two, with the mouse firmly fixed between her teeth.—Capt. Joshua Coddington has succeeded Gen. Pasley, C.B., as Government inspector of railways.—Tenders have been accepted for the erection of 800 houses at the Stratford depot of the Eastern Counties railway.—The Margate branch of the South Eastern line is to open on 1st Dec.

LEEDS, FRIDAY.—The market has been heavy since our last, and prices, with few exceptions, have given way. The Dewsbury meeting, on Monday, confirmed the amalgamation with the London and North-Western—subject to a recommendation, that the terms shall be a minimum guarantee of 7 per cent., instead of 7-10ths of the London and North-Western dividend. The shares are now worth 12*l.* pm.—they were at 14*l.* pm. previously to the meeting, in anticipation of a better offer from the Manchester and Leeds. This company's proposition, however, of a guarantee of 8 per cent., was declined by the meeting. North British scrip thirds have come into our market at 50s. pm.; the scrip quarters are at 20s. pm. TOOTAL, BARFF, & PLINT.

HULL, THURSDAY.—Business, since our last, has been tolerably brisk, although the market to-day has evinced signs of weakness. North British, North Westerns, and the York stocks, have declined; Malton and Driffields, Northern Counties Union, and Eastern Unions, have improved. The terms proposed for the East Anglian lines by the Eastern Counties are considered the reverse of satisfactory or fair, and will be strenuously opposed.

Consolidated Mines.—The usual two-monthly meeting was held at the mine on the 18th inst., when the accounts were submitted and passed as follows:—By balance from last account, 1418*l.* 4d.; ores sold, less dues, 8379*l.* 7d. =9797*l.* 11d.; to costs and merchants' bills for Sept. and Oct., 8340*l.* 16s. 9d.; balance in hand, 1456*l.* 4s. 2d.

A considerable mine of sulphur has been discovered at Gaudaloups in the Solfa Terra of Basse-Terre, the surface of which sank during the late earthquake.

Lead Mining in Derbyshire.—Some doubts are entertained that this branch of our national wealth and resources is, in this district, on the decline. Most of the mines are flooded with water, and others are to a great extent exhausted. A very many miners are now idle; and it is to be feared, that unless there be great speculations, there will be a great lack of employment for these very hazardous and praiseworthy underground labourers.—*Sheffield Iris.*

** We have been compelled to omit our RAILWAY SHARE TABLE.

RAILWAY TRAFFIC RETURNS.

From these returns, it will be seen, that the amount of traffic for the last week, on nearly 2760 miles of railway, was 138,342*l.*, thus accounted for:—70,366*l.* for the conveyance of passengers only, 38,443*l.* for the carriage of goods, and a remainder of 29,533*l.* for passengers and goods together, not respectively apportioned; being an increase over the corresponding week of last year of 15,519*l.*

Name of Railway.	Lgth. Rway.	Present actual cost.	Last Div.	Traffic Returns. 1846	1845
Arbroath and Forfar	15	£142,900	3 p.c.	£192 14 11	£144
Chester and Birkenhead	15	658,293	2½	515 19 0	515
Dublin and Drogheda	32	699,975	3½	673 1 3	617
Dublin and Kingstown	6	349,736	9	620 19 7	861
Dundee and Arbroath	17	156,324	6	269 8 8½	282
Durham and Sunderland	19	302,118	2	692 4 8	707
E. Counties & North. & East.	161	4,746,113	5	8051 14 5	5481
Eastern Union	—	—	—	423 0 0	—
Edinburgh and Glasgow	46	2,112,136	6	3295 4 6	2427
Glasgow, Paisley, and Ayr	53	1,301,381	7	2060 0 11	1857
Glasgow, Paisley, & Greenock	23	829,427	2	832 12 11	834
Gravesend and Rochester	7	82,828	—	—	118
Great Western	241	8,685,605	8	15588 0 0	15561
Hartlepool	—	—	—	—	1214
London and North Western	440½	16,327,526	10	36221 11 4	33387
London and Blackwall	4	1,081,273	1½	735 7 7	704
London & Brighton & South Coast	113	4,670,721	5	6748 5 4	4078
London and South-Western	106	3,648,547	10½	5556 0 1½	5896
Manchester & Leeds	117	4,636,556	8	8101 11 7	5919
Manchester, Bolton, & Bury	10	842,725	5½	—	889
Midland Company	331	8,831,195	7	17355 2 3	14981
Newcastle and Carlisle	65	1,137,385	5½	2000 19 4	1670
Norfolk	59	985,080	5	1306 3 10	1025
North British	72	1,461,195	—	1143 7 1	—
Preston and Wyre	29	432,014	2½	541 13 7	394
Sheffield and Manchester	49	1,633,331	5	1822 0 1	1064
South Devon	15	778,976	—	265 9 10	—
South-Eastern and Dover	120	6,613,535	3½	6678 4 5	5375
Taff Vale	30	690,229	5	966 12 11	1086
Ulster	25	356,353	5½	739 2 6	601
York and North Midland	162	2,092,979	10	5475 8 3	4893
Northern of France	260	—	4	—	—
Orleans and Bordeaux	72	599,040	4	—	—
Paris and Orleans	82	2,082,916	9½	—	5672
Paris and Rouen	85	1,995,306	8	5904 0 0	4998

PRICES OF MINING SHARES.

BRITISH MINES.

Shares.	Company.	Paid.	Price.
1024	Alfred Consols	4½	50
235	Andrew and Nangiles	28½	30
1000	Barristown	4½	27½ 30
4000	Bedford	2½	3½
128	Besore Lead Mine	14	30
320	Birch Tor Tin Mine	21½	14
8000	Blaenavon	50	40
256	Bodwannick	3	—
100	Botallack	175	300
120	Brewer	—	5
10000	British Iron, New, regis.	10	19
—	Ditto ditto, scrip	10	19
128	Budnick Consols	52½	45
100	Bwlch Cwmerlin	20	—
1000	Callington	19	25
256	Caradon Consols	45	18
256	Caradon Copper Mine	9½	5
256	Caradon Mines	15	24
256	Caradon United	24	10
256	Caradon Wh. Hooper	12	7
1000	Carn Brea	15	100
114	Charlestown	—	200
166	Cleveland	9	7½
1900	Combmartin	5½	4½
1000	Comblawn	½	2
128	Comfort	—	37
5000	Con. Tretoil Mining Ass.	3½	¾
128	Condurrow	36	55
2560	Cook's Kitchen	—	4
1000	Copper Bottom	1	5
1024	Cosheen	4½	30
240	Craddock Moor	15½	20
128	Creeg Braws	120	200
500	Cubert Mine	12	27½
7100	Derwent	8½	5
1024	Devon & Courtney Con.	5	4½
1000	Dhurode	2	5
186	Dolcoath	—	30
10000	Durham County Coal	45	9
256	East Alvenney	3	10
112	East Caradon	40	40
2048	East Crowndale	3½	2
128	East Pool	5	20
100	East Relistian	15	17
9000	East Tamar Consols	1½	3
—	East Wheal Albert	1	3
94	East Wheal Crofty	—	310
256	East Wheal Fortune	1½	3
256	East Wheal Kitty	¼	1
128	East Wheal Rose	50	1100
123	East Wheal Seton	9	25
512	Fowey Consols	—	40
20000	Galvanised Iron Co.	10	8
10000	Gen. Mining Co. for Irel.	½	½
1000	Godolphin	—	—
256	Gonamena	21	70
128	Gover	23	200
244½	Grambler & St. Aubyn	—	25
100	Great Consols	1000	400
256	Great Callestock Moors	11½	12
2560	Great Michell Consols	2	4
256	Great Resugga Moor	2	3
512	Gt. Wh. Rough Torr Con.	2	25
100	Grogwinion	5	—
1000	Gunnis Lake	1½	3
256	Gwinear Consols	5	25
1000	Hanson	14	3
1000	Harrowbarrow Old Mine	5½	2½
1000	Harrowbarrow Consols	2	¾
800	Hawkmoor	3	2½
6000	Heignston Down Con.	½	2½
256	Herodsfoot	14	5
10000	Hibernian	12½	1
—	Hobb's Hill	4	3
1000	Holmbush	18	13
256	Ivy Tor	1½	2½
827	Kirkcudbrightshire	3½	4½
2048	Lamherooe Wh. Maria	8	6
2048	Lanivet Consols	2½	2
200	Larkholes	1	3
160	Levant	—	90
1000	Lewis	15	10
1280	Llancynfelin	6	10
128	Ludcott	3	3
4000	Marke Valley	10	3½
5000	Mendip Hills	1½	1½
20000	Mining Co. of Ireland	7	12
200	Nanterrow Consols	14½	12
128	North Fowey Consols	20	22
100	North Pool	11	6½
70	North Roskear	10½	300
256	North Treburget	4	4½
100	North United	41	20
256	North Wh. Leisure	1½	4
128	North Wh. Providence	2½	10
256	North Wheal Rose	26½	13
15000	Northern Coal Co.	23	2
600	Old Delabole Slate Co.	25	45
128	Par Consols	—	900
256	Pembroke	½	2½
256	Penhallow Moor	15	4
6000	Pennant	1	1½
100	Penrhiw	30	65
128	Pen-y-Cefn Mine	50	55
1280	Perran St. George Un.	13	20
128	Perran Wh. Virgin	9½	38
512	Plymouth Wh. Yeoland	1½	3½
2048	Prince Edward	1½	1½
256	Redruth Consols	3	14
10000	Rhymney Iron	50	25
256	Rose Consols	10	3
1000	Rosewall Hill	1	5
2500	Silver Valley	3	2
256	Sourton Consols	3½	3
128	South Caradon	10	350
2000	South Dolcoath	2	—
256	Sth. Friendsh. Wh. Ann	7½	14
200	South Harvannah	23	26
9000	South Tamar	½	½
194	South Tolgus	2½	6
800	South Towan	10	1½
256	South Trelawney	12½	10
128	South Yeoland	16½	20

BRITISH MINES—*continued.*

Shares.	Company.	Paid.	Price.
128	South Wheal Basset	—	150
124	South Wh. Francis	67	200
256	South Wh. Hope	—	5
1000	South Wh. Maria	2½	2
256	South Wheal Rose	11½	1
10000	Southern & Western, Irish	2	4–5
256	St. Austell Consols	7	15
94	St. Ives Consols	—	600
1000	Stray Park	43	21
9600	Tamar Consols	3	5
1024	Tavy Consols	1½	3
6000	Tincroft	7	10
256	Ting Tang	89	30
128	Tokenbury	140	15
256	Trehane	2	18½
5000	Treleigh Consols	6	3½
256	Trenow Consols	—	30
96	Tresavean	10	225
120	Trethellan	5	20
120	Treviskey and Barrier	61	135
256	Trewallack	—	20
128	Trewellard	12	25
000	United Hills	5	2½
4100	United Mines	300	800½
256	Wellington Mines	15	25
128	West Basset	45	10
256	West Caradon	20	250
128	West Cargoll	2	12
512	West Fowey Consols	40	35
—	West Kekewich Consols	—	3
256	West Providence	—	12½
200	West Seton	—	40
120	West Trethellan	5	25
256	West United Hills	4	1½
256	West Wh. Friendship	7½	4
3845	West Wheal Jewel	11	2½
2560	West Wh. Maria	½	2
256	West Wheal Shepherd	—	6½
256	West Wheal Tolgus	21½	10
256	West Wheal Treasury	14½	10
240	Westerlake	3	3
5200	Wicklow Copper	5	16
184	Wheal Adams	41	30
1000	Wheal Agar	—	
256	Wheal Albert	10	8
128	Wheal Acland	13	2
256	Wheal Allen	½	4
368	Wheal Anderton	10½	11
128	Wheal Ann	—	50½
128	Wheal Arvose	2	2½
2560	Wheal Barbara	1½	1½
256	Wheal Blencowe	—	10
256	Wheal Byon Consols	½	½
136	Wheal Clifford	—	190
1024	Wheal Concord	6½	5½
512	Wheal Elizabeth	2½	3
256	Wheal Fortescue	5½	10
2048	Wheal Frederick	2	2
384	Wheal Franco	25	25
512	Wheal Fortune Consols	1	6
256	Wheal Gill	19½	18
128	Wheal Harriet	45	48
2048	Wheal Holwell	1½	1½
256	Wheal Jane	6	40
265	Wheal Kendall	11½	5
256	Wheal Kekewich	4	4
256	Wheal Louisa	5½	10
256	Wheal Maria (Hayle)	14½	28
1024	Wheal Maria	1	420
4000	Wheal Martha Consols	5	2½
256	Wheal Mary Ann	5	70
1024	Wheal Mary (Calstock)	4½	1½
256	Wheal Mary Consols	34	25
256	Wheal Mary Lanivet	2½	8
256	Wheal Mary Pentuan	1½	4
256	Wheal Maud	1½	4
128	Wheal Metha	21	110
256	Wheal Norris	9	2
128	Wheal Pollard	12½	12
210	Wheal Prospect	4	9
128	Wheal Providence	34	40
128	Wheal Reeth	1	60
128	Wheal Rose	40	25
512	Wheal Sarah	2½	5
99	Wheal Seton	150	800
1024	Wheal Spearne	1½	8
256	Wheal Sisters	27½	20
128	Wheal St. Cicer	21½	15
260	Wheal Trelawney	7½	120
256	Wheal Tremaine	1½	8
256	Wheal Trewennan	—	10
128	Wheal Venland	12½	10
256	Wheal Victoria	2	2
127	Wheal Virgin	—	50
1024	Wheal Walter	4	3
256	Wheal Williams	2	18

FOREIGN MINES.

Shares.	Company.	Paid.	Price.
5000	Alten Mining Company	14½	3½
15000	Asturian Mining Co.	6	5
20000	Australian	2	5½
10000	Anglo-Mexican Co.	100	1
3374	Ditto Subscription	25	2½
2000	Bolanos	150	6
12000	Ditto Scrip	15	6
10000	Brazilian Imperial	20	3
12000	Cobre Copper Co.	40	18
8500	Colombian Co. regis.	55	4½
5000	Ditto Scrip	—	
10000	Copiapo Mining Co.	14	2½
20000	General Mining Ass'n.	20	15½
5051	Mexican Company	59	—
12000	Mocaubas & Cocaes	25	6½
29320	Rl. del Monte, regis. / Ditto unregistered	28½	av. 3½
	Ditto Red Debentures	—	21
	Ditto Black ditto	—	18
	Ditto Loan Notes	150	120
7000	Royal Santiago	10	7½
2000	Pachuca Mines	3	3½
11000	St. John del Rey	15	8½
43174	United Mexican	28½	3½

** *We should feel greatly obliged by agents, or others interested, furnishing us with such corrections for our Share List as we may not have received through our usual channels of information—our object being, to present as accurate a list of prices as can be obtained—to procure which, we solicit the aid of correspondents in general.*

LATEST CURRENT PRICES OF METALS.

LONDON, NOVEMBER 27, 1845.

	£ s.	£ s. d.
Iron—Bar *a*..Wales..ton	8 15—	9 0 0
„ ..London	0 0—	10 0 0
Nail rods „	0 0—	10 15 0
Hoop (Staf.) „	11 5—	11 10 0
Sheet „ „	0 0—	13 0 0
Bars „ „	11 0—	11 10 0
Welsh cold-blast foundry pig	5 5—	5 10 0
Scotch pig *b*, Clyde	3 10—	3 12 0
Rails, average	0 0—	9 15 0
Russian, CCND *c*	0 0—	—
„ PSI	0 0—	—
„ Gourieff	0 0—	—
„ Archangel	0 0—	13 10 0
Swedish *d*, on the spot	11 10—	12 0 0
„ Steel, fagt.	0 0—	16 0 0
„ „ kegs *e*	14 15—	15 0 0
Copper—Tile *f*	0 0—	87 10 0
Tough cake	0 0—	88 10 0
Best selected	0 0—	91 10 0
Copper—Ordin. sheets, lb.	0 0—	0 0 10
„ bottoms	0 0—	0 0 11
Chilian, in cakes	0 0—	—
Tin—Com. blocks *g*..cwt.	0 0—	4 18 0
„ bars	0 0—	4 19 6
Refined	0 0—	5 1 0
Straits *h*	0 0—	4 18 6
Banca	0 0—	5 3 0
Tin-Plates—Ch., IC *i*, box	1 9—	1 11 0
„ IX	1 15—	1 17 0
Coke, IC	0 0—	1 6 0
„ IX	0 0—	1 12 0
Lead—Sheet *k*..ton	19 5—	19 10 0
Pig, refined	0 0—	21 0 0
„ common	18 5—	18 10 0
„ Spanish, in bd.	17 10—	18 0 0
„ American	0 0—	—
Spelter—(Cake) *l*	0 0—	19 5 0
Zinc—(Sheet) *m* export.*	0 0—	28 0 0
Quicksilver *n*..lb.	0 0—	0 4 6

a Discount 2½ per cent. *b* Net cash. *c* Discount 2½ per cent. *d* Ditto. *e* In kegs ½ and ¾-inch. *f* Discount 3 per cent. *g* Ditto 2½ per cent. *h* Net cash. in bond. *i* Discount 3 per cent. *k* Ditto 2½ per cent. *l* Net cash. *m* Discount 1½ per cent. *n* Discount 1½ per cent. * For home use it is 32*l.* per ton.

[*From our Correspondent.*]

Iron.—Welsh and Staffordshire are steady at quotations, with a fair demand; in Scotch pigs there has been very little done this week; the recent failure of a very large operator at Glasgow, has had an unfavourable effect upon the market; in Russian and Swedish nothing doing.

Copper continues steady, as also **Lead** and **Tin-Plates.**

Tin remains very scarce, with buyers of English at quotations, for arrival—the transactions in Banca and Straits are very limited; but stocks are low, and holders firm.

In **Spelter** nothing doing this week.

[*From a Correspondent.*]

English iron continues firm; but the transactions during the week have been few. Scotch pig-iron is quite neglected, owing to the failure at Glasgow of the principal operator in the article; it is, however, thought that it will be higher, as so few parcels are pressing on the market; 69s. to 70s. cash has been offered for mixed Nos., and 71s. cash for No. 1, and refused. Swedish iron and steel are firm. English copper without alteration. English block tin is nominally 98s. 6d. Smelters being very reluctant in making sales, Banca has been sold this week at 5*l.* 2s. Straits scarce. Tin-plates are in fair demand at quotations. In English lead there is little doing. Spelter has been sold in small parcels during the week at 19*l.* 5s.

GLASGOW PIG-IRON TRADE.

Nov. 25.—This week the trade has been rather depressed, by reason of an extensive failure. Prices have declined, and may to-day be quoted at 68s. 6d. for No. 3; 69s. 6d. for mixed Nos., and 71s. for No. 1—cash in 14 days. For immediate cash, mixed Nos. was sold to-day at 68s. 6d. and 69s.

THAMES TUNNEL COMPANY.

The number of passengers who passed through the Tunnel in the week ending Nov. 21, was 16,643; amount of money, £69 6s. 11d.

Contract for Iron Railings, &c., for Belgium.—The governor of Brabant has concluded contracts for 2000 tons iron rails, 600 tons iron sleepers, 20 excentrics complete, and 33 tons pins, divided into 10 lots, required for establishing double lines on the state railways of Belgium:—1st lot: 500 tons rails were contracted for by M. Pastor, of Cockerill and Co., Seraing, at 4*l.* 16s. 8d. per ton; the other lots, of 500 tons each, were taken by Belgian and French forgemasters at the same rate.—5th lot: 150 tons iron sleepers was taken by M. Elias, of Sclessin, at 8*l.* 8s. 2d. per ton.—6th lot: 150 tons to M. Dupont, at 7*l.* 16s. 8d. per ton.—7th lot: 150 tons iron sleepers, by Messrs. Cambier and Fontaine, at 8*l.* 4s. 2d. per ton.—8th lot: 150 tons to M. Dupont, at 7*l.* 16s. 8d.—9th lot: 33 tons pins, at 15*l.* 2s. 6d.; and 10th lot: 20 excentrics, at 15*l.* 8s. 4d. per ton. There was great competition to obtain these contracts, as they are expected to lead to other extensive affairs.

Great Northern (London and York).—About 75,000 tons of iron rails will be required for the formation of the entire line during 1847 and 1848. The first instalment of sleepers on which to lay them amounts to 500,000.

COPPER ORES.

Sampled Nov. 11, and Sold at Pearce's Hotel, Truro, Nov. 26, 1846.

Mines.	Tons.	Price
Consolidated	110	£8 4 0
ditto	108	3 3 6
ditto	90	4 15 0
ditto	76	9 10 6
ditto	71	4 2 6
ditto	63	3 2 0
ditto	61	5 2 6
ditto	60	5 9 6
ditto	59	3 14 6
ditto	57	6 7 6
ditto	55	4 14 0
ditto	43	3 18 0
ditto	37	2 15 0
ditto	18	4 12 0
ditto	9	5 17 0
United Mines	117	6 6 0
ditto	109	6 8 6
ditto	101	4 5 6
ditto	94	4 3 6
ditto	89	5 9 6
ditto	70	3 13 6
ditto	38	5 0 0
ditto	27	2 6 6
Tresavean	87	3 2 0
ditto	71	5 5 0
ditto	63	2 13 0
ditto	59	3 2 0
ditto	55	4 10 6
ditto	44	2 0 0
ditto	21	1 5 0
South Caradon	99	5 10 0
ditto	78	8 10 0
ditto	66	7 5 0
ditto	45	5 2 6
ditto	42	4 3 6
Perran St. George	81	3 9 6
ditto	55	4 14 0
ditto	50	2 13 0
ditto	32	7 8 0
ditto	23	7 8 6

Mines.	Tons.	Price.
Bolenna	26	£8 15 6
ditto	25	5 16 0
Wh. Leisure	22	7 2 0
Grambler & St Aub	68	7 15 6
ditto	66	5 5 0
ditto	61	5 17 6
ditto	49	2 18 0
Par Consols	71	4 19 6
ditto	70	5 2 6
ditto	55	4 15 6
ditto	34	5 9 6
Treviskey	90	6 0 6
ditto	74	4 19 0
ditto	62	6 16 0
Treleigh Consols	107	3 17 6
ditto	49	11 0 0
ditto	39	3 17 6
Ting Tang	82	4 6 6
ditto	40	5 7 0
Trethellan	93	2 19 6
ditto	32	5 19 0
Wh. Ellen	102	6 17 0
ditto	10	3 19 0
Barrier	58	4 12 6
ditto	42	3 5 0
Wh. Sisters	35	6 17 6
ditto	30	4 12 6
ditto	20	8 16 6
Wh. Comfort	53	4 9 6
ditto	27	3 1 0
Wh. Andrew	36	5 6 0
Nangiles	22	6 6 6
ditto	14	5 10 6
Wh. Clifford	55	4 11 6
ditto	9	3 7 0
Wh. Busy	29	8 7 0
ditto	22	2 6 0
Wh. Mary Consols	50	5 16 6
West Grambler	15	5 6 0

TOTAL PRODUCE.

Consolidated	917	£5312 3 0	Trethellan	115	435 14 6
United Mines	645	3258 19 0	Wh. Ellen	112	728 4 0
Tresavean	400	1355 8 6	Barrier	100	404 15 0
South Caradon	320	2019 9 6	Wh. Sisters	85	555 17 6
Perran St. George, Bolenna, Wh. Leisure	314	1609 8 0	Wh. Comfort	80	319 10 6
			Wh. Andrew, Nangiles	72	407 6 0
Grambler & St Aubyn	244	1375 13 6	Wh. Clifford	64	281 15 6
Par Consols	230	1145 9 0	Wh. Busy	51	147 15 0
Treviskey	226	1330 3 0	Wh. Mary Consols	50	291 5 0
Treleigh Consols	195	1104 15 0	West Grambler	15	79 10 0
Ting Tang	122	568 13 0			

Average Standard ....£106 11 0 | Average Produce 7½
Average Price per ton £5 5 0
Quantity of Ore .... 4357 tons. | Quantity of Fine Copper, 325 tons 14 cwts.
Amount of Money £22,731 14 6
LAST SALE.—Average Standard.......£ 94 3 0.—Average Produce....... 9½

COMPANIES BY WHOM THE ORES WERE PURCHASED.

	Tons.	Amount.
Mines Royal	373	£2595 5 6
English Copper	678	3628 6 9
Vivian and Sons	919	3949 15 0
Freeman and Co.	539	2523 18 3
Grenfell and Sons	293	1862 11 6
Crown Copper Company	81	483 17 3
Sims, Willyams, and Co.	657	3024 8 6
Williams, Foster, and Co.	817	4723 3 9
Total tons	4357	£22,731 14 6

Copper ores for sale on Thursday next, at Andrew's Hotel, Redruth.—Mines and Parcels.—Camborne Vean 604—East Wheal Crofty 383—Wheal Seton 505—Tincroft 383—Dolcoath 294—Fowey Consols 205—South Wheal Basset 186—Condurrow 153—South Wheal Francis 150—North Pool 150—East Pool 82—Lanivet Consols 70—Wheal Bucketts 61—Godolphin 60—Tretoil 56—Hanson Mines 32.—Total, 3574 tons.

Copper ores for sale on Thursday week, at Andrew's Hotel, Redruth.—Mines and Parcels.—Carn Brea Mines 575—Par Consols 250—United Hills 241—Wheal Prosper 219—Wheal Virgin 196—Wheal Tremayne 165—Trenow Consols 64—Providence Mines 56—Wheal Rodney 50—Wheal Kayle 41—North Wheal Basset 28—Bastian's Ore 22—Wheal Trenwith 21.—Total, 1928 tons.

COPPER ORES

Sampled Nov. 4, and Sold at Swansea, Nov. 25, 1846.

Mines.	Tons.	Prod.	Stand.	Price.
Chili	95	26½	88	£21 6 0
ditto	91	20½	90½	16 6 6
ditto	86	20½	90½	16 8 0
ditto	79	26½	88	21 3 0
ditto	97	26½	89½	21 16 0
ditto	96	33½	85½	26 5 0
ditto	50	46½	85½	37 7 6
ditto	47	49½	83½	39 1 0
ditto	42	47½	85½	38 10 6
ditto	11	48	86	39 2 0
Cobre	100	14½	91	10 11 6
ditto	87	14½	91½	10 16 6
ditto	85	22½	85½	17 4 6
ditto	80	21½	80½	16 3 0

Mines.	Tons.	Prod.	Stand.	Price.
Cobre	75	21½	87½	£16 4 0
ditto	59	21½	86½	16 4 0
ditto	100	24½	85½	18 14 6
ditto	71	21½	87	16 11 0
Berehaven	115	10½	100½	8 0 6
ditto	87	9½	100½	7 10 6
Cuba	100	14	91½	10 10 6
ditto	90	13½	91	10 5 0
Ballymurtagh	90	3½	129½	2 15 6
Kanmantoo	78	20	92	16 3 0
Cronebane	43	4½	117	3 6 0
ditto	19	5½	108	4 2 0
Kaw-aw	25	11½	97	8 18 0
Llanidloes	7	8½	103	6 18 0

TOTAL PRODUCE.

Chili	694	£16977 3 6	Kanmantoo	78	£1259 14 0
Cobre	657	9973 15 0	Cronebane	62	219 16 0
Berehaven	202	1577 11 0	Kaw-aw	25	222 10 0
Cuba	190	1975 0 0	Llanidloes	7	48 6 0
Ballymurtagh	90	249 15 0			

Total tons, 2005.—Total amount, £32,503 10s. 6d.

COMPANIES BY WHOM THE ORES WERE PURCHASED.

	Tons.	Amount.
English Copper Company	175	£4190 17 0
Freeman and Co.	160	2215 7 6
P. Grenfells and Sons	348½	2552 9 3
Sims, Willyams, and Co.	237	3343 0 6
Vivian and Sons	615	9690 12 9
Williams, Foster, and Co.	469½	10511 3 3
Total tons	2005	£32,503 10 6

Copper Ores for Sale Dec. 9.—Chili 86, ditto 84, ditto 82, ditto 51, ditto 50, ditto 40—Cobre 105, ditto 80, ditto 67, ditto 58—Cuba 86, ditto 84, ditto 79—Burra Burra 61, ditto 60, ditto 59—Australia 54, ditto 1—Glasgow Slag 36—French Slag 35—Sidney 27—Montacute 24—Paringa 19—Santa Anna 14—Cwm Sebon 13—Florida 1.—Total, 1356 tons.

COAL MARKET, LONDON.

PRICE OF COALS PER TON AT THE CLOSE OF THE MARKET.

MONDAY.—Hasting's Hartley 16 9—Stewart's Hartley 15 9—Shaftoe Hartley 15 6—West Hartley 16 6—Wall's End Acorn Close 18 6—Clarke and Co. 17—Hotspur 18—Killingworth 18 6—Walker 18 3—Finchale 18 6—Morrison 18 3—Seymour Tees 20—Blaengwawr 21—Stone Coal Culm 19.—Ships at market, 35.

WEDNESDAY.—Davison's West Hartley 16 3—Hasting's Hartley 16 6—Nelson's West Hartley 16 3—Stewart's Hartley 15 9—West Hartley 16 3—Wall's End Walker 18—Eden Main 20—Haswell 21—Hetton 20 9—Lambton 20 6—Morrison 18 3—Whitwell 18—Adelaide Tees 20—Tees 20 9.—Ships at market, 36.

FRIDAY.—Adair's Main 16—Chester Main 16 6—Davison's West Hartley 15 6—Hedley's Hartley 13 6—Hasting's Hartley 15 6—Holywell Main 19—Nelson's West Hartley 15 6—New Tanfield 15 6—Original Bute's 15 6—Ord's Redheugh 15 6—Tanfield Moor 18—Townley 17—West Hartley 15 6—Wylam 18—Wall's End Bewicke and Co. 18 3—Bell and Brown 18 3—Clennell 16 6—Heaton 17 9—Hilda 17 3—Hotspur 17 3—Northumberland 17 6—Riddell's 17 9—Willington 17 6—Eden Main 19 9—Belmont 19 6—Braddyll's Hetton 19 6 to 19 9—East Hetton 18—Haswell 20—Hetton 19 6—Lambton 19 6—Russell's Hetton 19 6—Stewart's 19 9—Cassop 19 6—Heugh Hall 19—Hudson's Hartlepool 19—Adelaide Tees 19 3 to 19 6—Seymour Tees 19—South Durham 19 6—Tees 19—Edgar 15—Derwentwater Hartley 15 6.—Ships at market, 179.

MEETINGS OF SCIENTIFIC BODIES DURING THE WEEK.

Society.	*Address.*	*Day.*	*Hour.*
Royal Botanic	Inner Circle, Regent's-park	Saturday	3½ P.M.
British Architects	16, Grosvenor-street	Monday	8 P.M.
Medical	Bolt-court, Fleet-street	Monday	8 P.M.
Royal	Somerset-house	Monday	4 P.M.
Linnæan	Soho-square	Tuesday	8 P.M.
Horticultural	21, Regent-street	Tuesday	2 P.M.
Society of Arts	Adelphi	Wednesday	8 P.M.
Geological	Somerset-house	Wednesday	0½ P.M.
Antiquaries	Somerset-house	Thursday	8 P.M.
Botanical	20, Bedford-st., Covent-gar.	Friday	8 P.M.
Westminster Medical	27 A, Sackville-street	Saturday	8 P.M.

NOTICES TO CORRESPONDENTS.

The MINING JOURNAL is published at about Eleven o'clock on Saturday morning, at the office, 26, Fleet-street, and can be obtained before Twelve of all the news agents, at the Royal Exchange and neighbourhood.

*** Our next JOURNAL will be on the usual ENLARGED SHEET, and will contain, besides several articles and miscellaneous intelligence, now necessarily omitted—Continuation of the series of papers on the METALLURGICAL TREATMENT OF ORES, &c.—An interesting paper on the Manufacture of Coal Gas, and its Distribution.

PARSEY'S COMPRESSED AIR-ENGINE.—In answer to several correspondents, we are informed that the company is *bonâ fide* constituted, and that measures are being adopted for giving it a fair trial on a full working scale. We are not in possession of particulars; but on the earliest knowledge of any experiments being made, we shall endeavour to report the result.

"G. A."—We cannot give the "opinion" required by our correspondent—he must apply to some sharebroker, or obtain a prospectus from the company, and judge for himself.

DR. RITTERBANDT'S PATENT.—We have received a communication from Mr. Gillot, in which he expresses regret for having unintentionally offended the feelings of Dr. Murray; but, as we have felt called upon to offer some remarks of our own on the subject, the insertion of his letter is unnecessary. We have also received the letters of "An Old Subscriber" (Teignmouth), addressed to Mr. G., and also to the Editor direct.

Some remarks, which appeared in the *Morning Post*, of Wednesday, are deferred from want of space, and not requiring immediate notice. The deductions drawn from the figures quoted are, we have no hesitation in saying, incorrect; while the evidence adduced has reference to so small a "make," and the question of coke, even as regards price, not to advert to it as applied only to boilers of furnaces, and not to blast-furnaces, is such as to render it perfectly inapplicable.

Received.—W. G. (Plymouth)—T. S. (Bridgewater)—A. T. J. M. (Penzance).

THE MINING JOURNAL
And Atmospheric Railway Gazette.

LONDON, NOVEMBER 28, 1846.

As the conductors of a Journal devoted to the pursuits of science, we feel it our duty to afford opportunities by which its promoters may at all times, when misrepresentations have got abroad, set themselves right with the public; and it is with pleasure that we now call attention to the subject of the patent of Dr. RITTERBANDT, for preventing incrustation in steam-boilers, convinced as we are that he has been an ill-used man. The article in the *Pharmaceutical Times*, from whatever motives written, has done all the mischief—and which, from official and other documents that we have had an opportunity of inspecting, we believe to be a tissue of falsehoods from beginning to end. As to who was the inventor or discoverer of the method, there does not require a word—Dr. RITTERBANDT is in the safe enjoyment of his patent; but the absurd charge, that he was such a novice of a chemist, that, on one occasion, he supplied *sulphate* of ammonia, requires explanation—and only shows on what slender grounds a badly-disposed man may found a charge. Dr. RITTERBANDT was, on one occasion, supplied with muriate of ammonia, which, unknown to him at the time, contained a large portion of sulphate—a portion of this he sent to a firm using his patent, to whom, of course, it would have been worse than useless, had it been used; but, on the discovery being made, he immediately took it back, and sent in a supply of pure muriate: this is the whole fact of the case; and, in his specification, it will be found he claims only for the "muriate," the "nitrate," and the "acetate" of ammonia—three salts which have been found to meet every case of boiler deposit, and which form soluble salts by the double decomposition with the salts of lime. We have seen numerous testimonials, from some of the largest manufactories in the kingdom, as well as from several of the most eminent steam-vessel builders, agents of steam-boat companies, and from conductors of locomotive departments, from which it is clear the use of Dr. RITTERBANDT'S patent gives universal satisfaction, may be used for months without requiring blowing off, and is a great saving of expense, both in tubular and marine boilers. We regret that the article in question should have misled our respected correspondent Dr. MURRAY, as we also regret our insertion of Mr. GILLOT'S letter in its objectionable form—for, had we noticed the offensive sentences before going to press, we should certainly have clothed it in gentler garb. Dr. MURRAY'S character, however, as a philosopher and chemist, stands too high to be injured by the puny shafts of thoughtlessness or expressed malice—the former of which was, doubtless, the cause of the assertions in the letter complained of. Our object in these few remarks is to do justice to a clever and an honourable man; and, we trust, they will, in some measure, rescue Dr. RITTERBANDT from the unmerited ridicule and obloquy which has been attempted to be heaped on him.

[FROM A CORRESPONDENT.]

The question of the repeal of the duties on foreign copper ores exciting a good deal of attention at the present moment, it is proper that the question should be clearly understood, and laid before the public in so ungarbled a shape, that its real merits may be thoroughly understood—when it must appear to every unprejudiced mind, that the present duty, so far from aiding our home miners, will, if retained, prove the germ which, at no distant day, will become a most powerful and successful competitor for the copper markets of India, America, and other distant parts of the globe, at present entirely in our hands. Previous to 1842, all copper ores imported into this country were smelted in bond, and the produce, or a quantity of copper, corresponding with the assay, re-exported. In that year an Act was passed, admitting foreign ores on the same footing as our Cornish ores, to be used for home consumption or exported—paying, however, a duty proportionate to their richness. On the agitation, and before the passing of this legislative measure, the miners began to cry out the old cry of monopoly—ruin! ruin!—even with the duty for their protection; but, during the four years that this Act has been in operation, the home mining interest has considerably advanced, and the manufacturers of brass and copper begin to complain of ill-usage. In a memorial, which is now going the round of Birmingham for signature, it is shown that Chili had been for many years an extensive and increasing customer for British goods, which were paid for by ores; and that these ores were, therefore, of great value to the British merchant—that the British miner had ample protection in the expense of raising the Chilian ores, and in the great cost of conveyance to the shipping—that, previous to 1842, smelting in Chili had nearly ceased, but that since then it has been most extensively resumed, and that in consequence, instead of ores, copper bars and pigs are being sent to Europe—and that there has been of late years a great falling off in the export to the continent and to America in manufactured articles of copper and brass, in consequence of the same being supplied by France and Belgium, who have unrestricted trade in foreign copper and copper ore. It is also a well-known fact, that smelting-works are being proceeded with to an unprecedented extent in the United States—the promoters of which are making most liberal offers for the purchase of the rich ores of Chili. With these facts before us, is it not better to hold on to the copper trade of the world while we can, instead of listening to the futile fears of men who are blind to the real merits of the case? especially when it is known, that these rich ores so complained of, cannot be smelted, without the admixture of the poorer Cornish ores, and which, from that very circumstance, will always command a market equal in price to the richer foreign produce in proportion to their assay, and always with a balance largely in their favour from cheaper raising and less cost of freight and carriage. To protect our established foreign copper trade is to protect the home miner; and while taking foreign ores, which are paid for by British manufactures, our position as smelters, surrounded by the necessary materials—coal, limestone, &c.—will enable us to compete with, and supply, the world; while, should this obnoxious duty be retained, injurious alike to the miner and the manufacturer, a few years will see our foreign trade dwindled to a mere name, our boasted capabilities of no avail, and our present proud position in the metal markets of the world shrunk into insignificance when too late to rectify our error.

In last week's MINING JOURNAL, we had to record one of those dreadful calamities which so often depopulate our coal mining districts, and carry desolation and despair among a large portion of the survivors: we allude to the explosion in Mr. PARKER'S Colliery at Oldbury, where 20 lives were sacrificed; and in the same column was the record of another, at the Victoria Colliery, by which four lives were lost. It is our painful duty again, in our present Number, to record two more accidents of the same description, sacrificing 12 lives; one at Eastern Burgh, near Preston, and the other at HARVEY'S Coppell Colliery. This reckless destruction of human life confirms the observations we have made, and followed up from time to time—that until some legislative measures are adopted, compelling the properly ventilating, and the scientific and safe working of coal mines—so long will our columns teem with those melancholy recitals, and widows and orphans be multiplied to an awful extent. The evidence taken before the Coroner, at the inquest, on the sufferers at Oldbury, we have thought of sufficient importance to give at considerable length in another column, as showing the careless and ineffective manner in which the ventilation of the pit has, for years, been carried on; more than one witness deposed to having worked there on previous occasions, and that they left their work from the disgraceful and dangerous state of the levels—sometimes being so foul that they could scarcely breathe, and making them seriously ill. So strong was the evidence considered by the jury, that in one case they found a verdict of manslaughter against the agent, Mr. HAINES, who was committed accordingly. It is only by some strong measures like this, that coal owners and viewers can be roused from their apathy, and be taught to look a little to the lives and limbs of those from whose labours they obtain their wealth; and we sincerely hope that Government will now seriously take up the subject, appoint a Commission, and establish a Board of Inspection, not merely to write a scientific report, but practically to investigate the subject in the mining districts, and establish a code of laws for the regulation of coal mining, which, while it will be compulsory on agents to follow, according to circumstances, will take advantage of every scientific discovery and improvement, and relieve this labouring occupation of at least a portion of the present awful uncertainty of life.

It will be observed also, that a numerous meeting, arising out of this unfortunate accident, has been held at Dudley; and a memorial, strongly expressive of the feeling of the inhabitants, drawn up, to be presented to Sir GEORGE GREY, the Secretary of State for the Home Department, praying for investigation: we trust these joint appeals will have their due weight.

In another column will be found some observations on the salt monopoly of Europe and the East Indies; and a large and influential meeting of bankers, merchants, and manufacturers, was held at Manchester, on Thursday last, for the consideration of the cruel, oppressive, and injurious tendency of the tax on salt in India—the result of which fully bears us out in the remarks which we have felt it our duty, on various occasions, to make. The gist of the resolutions was to the effect, that the salt revenue in India was indefensible in principle, oppressive to the people, and ought to be abolished; that the system, under which salt was distributed, caused a deficiency of supply, enhancement of price, deterioration in quality, and much privation and suffering—that the monopoly is not only unjust and cruel to the population, but a direct contravention of the Charter granted the East India Company—and that a petition be drawn up, embodying the resolutions, praying that all duty on salt, whether manufactured in, or imported into, India, may forthwith cease; and that the manufacture thereof by the company be discontinued at the earliest practicable period—and that such petition be intrusted to the Members of the borough for presentation to Parliament. From the numbers who formed, and respectability of the meeting, who appeared to be but of our opinion, as to the injustice and impolicy of this impost, an idea may be formed of, the general feeling of commercial men, in all parts of the kingdom, on the subject. We hope this petition will call the attention of the Government to the question; and, if the company will not take some steps to remove the obnoxious tax, and submit to have the abortion strangled with a good grace, that a legislative enactment will pass, giving the population of India some of the advantages possessed by their fellow subjects at home, and throw open a new source of employment for our shipping interest.

On Wednesday last, the MASTER of the ROLLS gave judgment in the case of HAINES *v.* TAYLOR, respecting the WESTERN GAS COMPANY. The plaintiff possesses a very handsome house on the north side of the canal, the grounds running down to the banks, and a few hundred yards from the site on which the works are being erected on the south side: he is one of the alarmists we have before alluded to, and filed his bill for an injunction to restrain the defendants from proceeding with the erection. His HONOUR, however, considered that the mere building of the works could be no nuisance; and that, as the manufacture of gas would not commence before the month of March, the result was, that the damage was prospective, future, and contingent. The case was new in this respect; there was no instance in which the Court had interfered where there had not been works begun, and an injury done, which was capable of being made the subject of legal proceedings, except, perhaps, the case of CROWDER *v.* TINKLER. The Court would sometimes be so impressed with the apprehended danger as to stop works until a trial: it depended on the circumstances. The Court had no jurisdiction to determine whether a particular act was a nuisance; but it had jurisdiction to protect the rights of persons from the effects of a nuisance, which a court of law had no power to prevent. No case had been adduced in which it had been held at law that the manufacturing of gas was to be deemed a nuisance. He was persuaded that the progress of science might discover means of making noxious matters enter into combinations in which they should not be hurtful; and there was the evidence of able men, that they could be governed and suppressed so far as they were not made to enter into other combinations in which they should be innocent. There were, indeed, scientific men who expressed their belief, that this could not be done; but, on the other side, there was the evidence of scientific men, that it could be done. Mr. PALMER did not state the means by which he proposed to effect this desirable process, but we had experience that science had almost completed the prevention of these noxious and deleterious consequences. If so, were these works to be stopped, merely because they were intended for manufacturing gas? Could it be said beforehand that gas could not be manufactured without these deleterious consequences? He could not blame the plaintiff for making the application at the present time; under the circumstances, he could not grant the injunction. The apprehensions of the plaintiff might turn out in the end well grounded; but, on the other hand, he was far from saying, that the defendant might not be able to prevent any nuisance. He believed it to be possible. He declined to grant the injunction at present, but he must do so in such way as to give the plaintiff an opportunity of bringing the matter before the Court at a future time. He did not mean to declare, that there was no nuisance by refusing the injunction. His LORDSHIP ordered the motion to stand over until after the works were completed—thus the plaintiff is left precisely in the position he was in previous to his dabbling in Chancery, with the pleasures of paying for nothing—viz.: having the privilege of proceeding by bill of indictment against the company, should the works, when in operation, prove a nuisance. The MASTER of the ROLLS took a liberal view of the facts of the case; and, while his decision appears to similate with common sense, and what we might expect from a verdict at common law, it is strictly within the rule of equity allowing the defendant to proceed with works which cannot be a nuisance, and giving an opportunity to the plaintiff to renew his complaint, if they eventually prove injurious.

In our columns of to-day will be found a report of the proceedings of the Asturian Mining Company, which holds out highly productive returns, if we may judge from the report presented by the directors. It appears that the total expenditure of the company has been about 75,000*l.*, while no returns have yet been made: indeed, the iron-works and collieries on which the great dependance has been heretofore placed, cannot be expected to be in a state of profitable working for some months. In the meantime, it is highly satisfactory to learn that the Quicksilver Mines, taken up by Capt. O. H. MATTHEWS, (and who, we believe, returns to the Asturias, with the view of taking their direction or management) are highly productive, and give great promise. The present instance affords one of the strongest proofs, if we may judge from the report of the directors, and the evidence we have otherwise acquired, that it is impolitic to act on the counsel or advice of those who are not practically acquainted with the subject, on which they presume to advance an opinion—inasmuch, that Mr. J. MANBY, C.E., the superintendent or agent of the company, and who has expended some £60,000, or thereabouts, on the iron-works, with some few thousands on surveys, advanced his opinions on the outset, that the Eugenia (cinnabar) Mine was both worthless and unprofitable. He has, however, altered his opinion; and we would advise, in all similar instances, that gentlemen should confine themselves to those matters with which they are most conversant. The prospects of the company, we are glad to say, are looking well, with every prospect of the returns, on an outlay of 2700*l.*, yielding a handsome dividend on the capital of 75,000*l.*, and a further contemplated sum of 20,000*l.*, while the returns of the quicksilver ore at surface are only estimated at a few hundreds.

At a moment when considerable interest is manifested as regards the construction of iron vessels, more especially for war purposes, the information lately received from La Plata is calculated to create some alarm as to the results. We will briefly narrate the substance of the information conveyed—while it will be our province, so far as appears to us to be feasible, to hold out that desideratum which must be obvious—viz.: the avoidance of the fractures produced, and, consequently, the splinters distributed, or spent among the crew of the vessel. The *Gorgon* steamer, which has lately arrived from La Plata, gives a sad account. It appears, that the effect produced on the hulls of the *Harpy* and *Lizard* steamers, by the shot from the batteries of La Rosas, were most serious, and such as were far from being contemplated. It was expected, from the nature of the material, that any breach made by shot would leave a clean fracture, merely curling up the lips of the orifice, as is usual when fractures are caused in iron by the application of an ordinary force. The results, however, are quite different; as, instead of a clean fracture, large splinters of iron flew about in all directions on the hull being struck, rendering the danger from this cause tenfold more imminent than that produced by the shot itself. Several splinters of this kind, struck from the hull of the *Harpy*, have been brought home by the officers of the *Gorgon*; and, amongst the rest, the splinter from the angle iron, which caused the death of Mr. BARNES, the clerk in charge—proving that the tendency to splinter is not confined to the thin sheet-iron of the hull, but to the heavier masses which compose the vessel. This circumstance would lead us to suppose that the application of the Kamptulicon, or Indian-rubber substance, which was tested, if we recollect aright, in August last, at Woolwich, would have the desired effect—inasmuch that, by the experiments made, Kamptulicon wall, or resistance, after the ball (32-pounder) had passed through the substance, 6 inches in thickness—the ball, according to the orifice formed, being 8 inches in diameter—was left in a comparatively perfect state, from the adhesion of the substance of which the wall, or resisting power, was formed—and which, on trial, was found to be impermeable; and having obtained from the company one of the pieces tested, such may be examined at our office. We understand the specific gravity, or weight, is about one-half that of oak; but this we have not tested. The cost, we understand, of the application of the Kamptulicon to a vessel, of large calibre, would not exceed 2000*l.* to 3000*l.*; and while 30,000*l.* has been expended by Government in testing Lord DUNDONALD'S experiments, we think a fair field is open to them in the present instance.

GOLD MINES OF GUINEA.—In a former Number, we alluded to the fact of the Dutch Government intending again to undertake the working of the gold mines on the coast of Guinea, in Africa: several attempts have been made at former periods, all of which failed, either from the insalubrity of the climate, or from the inexperience of those employed. Last summer, one of the officers of the Colonial Department was sent into Saxony, to engage a staff of experienced miners, educated at the Royal School of Mines at Freyburg; and, from the advantageous offers made by the Dutch Government, the King of Saxony allowed a selection to be made, who will sail for Guinea at the commencement of the year under leave of absence for three years. The Dutch have agreed to convey them and their families to Guinea, provide them with every necessary, and, at the expiration of the three years, those who wish to return are to be sent back free of expense. It may not be, perhaps, generally known, that the miners in Saxony, Austria, Prussia, Sweden, and Russia, are not free agents—nor can they leave the mines without special permission from the Government, as they are considered the property of the state and the public.

FAUVELLE'S SYSTEM OF BORING AT THE ARTESIAN WELL AT SOUTHAMPTON.—In consequence of the recommendation of Mr. Vignoles, and other gentlemen, at the meeting of the British Association in September last, to try Fauvelle's system of boring at the Artesian well at Southampton, a commencement has been made under the direction of Mr. J. Lankester, and which has fully proved the entire efficiency of that system, as regards its extraordinary speed in boring, and economy in working. An accident has happened, in no way connected with the system itself, which has prevented its full development, and this delay will continue all next week—the engines being required to work day and night to supply the reservoirs with water; the success of the plan has been completely established.

HOT AND COLD BLAST IRON.—The *Scottish Guardian*, of Tuesday, after quoting our notice of Mr. Stephenson's experiments, adds—"We have been informed of an experiment of the same nature, which was performed at Monkland Iron-Works last week. A railway bar of malleable iron, or 75 lbs. per yard, made at these works, where hot-blast is employed, was subjected to the following severe test:—The bar was placed betwixt two points 4 ft. apart, and an iron ball of upwards of 30 cwts. was dropped upon it from a height of 30 ft., which only had the effect of bending the bar. This test is considerably more trying than iron of that size is usually submitted to, and proves the superiority of the malleable iron made with hot blast."

PROGRESS OF FRENCH MINING INDUSTRY.

[FROM OUR PARIS CORRESPONDENT.]

The *Moniteur*—the official organ of the French Government—contains this morning this notice, published by order of the Minister of Commerce: "*Discovery of a Mine of Mercury at Monterey, California.*—Dispatches from consuls set forth that a mine of mercury has just been discovered near Monterey, on the territory of the mission of Sainte Claire. The working of this mine has already been commenced; and the results obtained, with most imperfect means, have, it is certified, surpassed the most favourable calculations. The extraction of ore is very easy, and the yield 25 per cent. of mercury. Fuel is plentiful in the neighbourhood, and costs nothing more than for cutting and conveyance. The precarious situation of California, and the war in which Mexico is engaged, will, without doubt, render the formation of a company, for the working on a grand scale of this mine, extremely difficult; but it is stated, that the products, which are considerable, are easily realised, on account of the immediate vicinity of Mexico, where large quantities of mercury are consumed." This paragragh may be worthy the attention of such of your readers as are interested in Mexican mining matters.

The intelligence of a terrible explosion in the silver mine of Idria, near Laybach, in the Austrian territory, is confirmed. Sixteen men, it appears, were killed, and the shaft had to be closed.

King Louis Philippe is stated to be personally responsible in a great measure, for the excessive dearness of iron in this country. His Majesty possesses personally, or has the control over, such an immense number of forests, that he is able to fix the price of wood in the market; and, he being a shrewd money-making fellow, takes good care to fix that price exceedingly high. Most of the iron furnaces in France being heated exclusively by wood, it follows naturally enough that, when they pay an enormous price for their wood, they must clap it on to the iron they fabricate, so as not to be losers. This they do; and thus it arises that Louis Philippe takes a good slice in the odious impost which the excessive dearness of iron causes to be levied on the French people.

I omitted to state, in my last, that the Marine Department had advertised for contracts, to be taken on the 5th and 12th of December next, for the supply of several million kilogrammes of coal, and several million kilogrammes of different descriptions of iron, to the establishments at Nevers, Toulon, &c.

Messrs. Schneider and Co., of the iron-works at Bazeilles, in the department of the Ardennes, have published in the *Siecle* a long letter, in answer to the statements of M. Leon Faucher, relative to the inability of the ironmasters to fulfil their engagements. It would take too much space to translate this epistle; but the substance of it will be gathered from the following summary of M. Faucher's remarks upon it:—Messrs. Schneider contend that the delay that has taken place in the execution of the orders they had accepted from the St. Germain Railway Company, was not owing exclusively to them, but mainly to the company's agents making frequent modifications in the plans of the tubes. In reply to this, M. Faucher cites a letter from the engineer of the company, stating that it is perfectly false that any modification had been made in the plan of the tubes furnished to the ironmasters two months before the treaty was entered into. The dimensions of the tubes were minutely indicated in the treaty and the plans; and it not true that Messrs. Schneider had, as they pretend, to wait for a model, for no model was ever made, or ever promised. But this was previous to December, 1845; and M. Faucher says that, in that month, a new contract was entered into, by which Messrs. Schneider engaged to deliver, before the 1st of May, 1846, the tubes of 63 centimetres, and before the 1st of July, the tubes of 38 centimetres. This contract, says M. Faucher, has not been fulfilled; for though Messrs. Schneider assert that they have fabricated the whole of the 63 centimetre tubes, they had, on the 1st of May, delivered only 86 tubes, instead of the 1150 they were bound to do; and that, at the end of October, they had only delivered 695, of which a great number were full of defects, and of which only 150 were in the workshops, *d'ajustage*. There remained then to be delivered 455 great tubes; whilst as to the smaller ones—in the fabrication of which Messrs. Schneider admit that there is no difficulty—they had not delivered a single one. Besides this, Messrs. Schneider's contract required that the tubes should not only be delivered, but adjusted in the time specified; but the fact is, that their tubes are made of a material so bad, that they are extremely difficult to adjust. They complain that the machines they caused to be supplied, after those of Whitworth, employed generally in England, took 10 hours to do what they had calculated could be done in less than two—but that is their affair; and besides, the tubes of Fourchambault, made of softer material than theirs, are easily adjusted to the extent of eight per day—so that in every respect Messrs. Schneider are responsible for the breach of their contract; but it appears that they assert that no English establishment could have made the tubes in less time than they did, or rather neglected to do. To this strange assertion, M. Faucher says, that the St. Germain Company has received from an English establishment an offer to supply, in three weeks or a month, from 500 to 1000 tubes ready adjusted He shows, besides, that even a French establishment—that of M. Emile Martin—had made and delivered 150 tubes in three months, and had offered to supply 3000 in a year. The English establishment would have supplied the 3000 in three months. Thus, says M. Faucher, at the rate of 545 tubes in 20 months, which is all they have accomplished thus far, Messrs. Schneider would require more than nine years to execute a contract that M. Martin can execute in a year, and an English company in three months. At the commencement of their letter to the *Siecle*, Messrs. Schneider pretended that they had been duped into accepting the contract of the St. Germain Company, and that it had been taken by one of their agents. M. Faucher calls this a "fable;" and certainly nobody on earth will believe that such men as Messrs. Schneider allow the affairs of their vast establishment to be so conducted; but, to prove it a fable, M. Faucher cites a letter, dated the 6th of March, 1845, from Messrs. Schneider, in which they state that they had brought up their manager, M. Bouting, to Paris, expressly to treat the affair of the tubes. To this, M. Faucher might have added, what everybody in Paris knows, that this very Mr. Bouting is one of the keenest and most knowing men of business France possesses —the very last man, in fact, in the whole kingdom to allow himself to be duped into an unprofitable transaction. M. Faucher, however, admits that Messrs. Schneider treated for the tubes for 40 fr. less per ton than was demanded by the other ironmasters; but says that, even at that price, they were 95 fr. more than those of England. At this present time, M. Faucher observes, the tubes of England cost 250 fr. the ton—and, if there were no duty, could be delivered in Paris at about 300 fr.; the price demanded at present by the French establishments is 450 fr. In England, says M. Faucher, the price of tubes rose only in proportion of the advance in the price of material; and adds—"With our neighbours, the maker contents himself with *une marge* of 125 fr. per ton; with us, thanks to the monopoly, the present price would leave *une marge* of 275 fr." Among the excuses made by Messrs. Schneider for the non-delivery of their tubes, is one, that the stationary machines had not been delivered; but not only does M. Faucher show that, if true, this would be no excuse for their breach of contract at all, but he states positively that the delivery of the machines was allowed to be delayed expressly on account of the inability of Messrs. Schneider to deliver their tubes.

Such is an epitome of Leon Faucher's answer to Messrs. Schneider; and I think it will be admitted that it is full and complete. It shows the total inability of the ironmasters to fulfil their engagements;—and yet, like the dog in the manger, they will not allow others to do what they cannot. But, as if his demolition of the unhappy Schneiders were not sufficient, M. Faucher states other facts, which show the deplorable effect of the iron monopoly. Thus, he says that the Northern Railway Company has only received eight tenders, instead of 37, that ought to have been delivered towards the supply of an order for 123, received by Messrs. Farcot, Stehlin, and others. The reason is, that the constructors cannot obtain the springs, iron, &c., that they require. Messrs. Schneider du Creuzot had engaged to deliver before this, to the same railway, 10 locomotives—not one has been delivered, entirely on account of the scarcity of *tôles*. M. Emile Martin had engaged to deliver, to the same railway, 60 *croismens de voie*, and 85 *plate-formes*. On account of the scarcity of iron, he has only been able to deliver 21 of the former, and 23 of the latter. Messrs. Buddicombe (they are Englishmen established in France) undertook to deliver 96 *croismens* to the same railway; but, in consequence of the scarcity of iron, have only delivered 15. Messrs. Buddicombe, Stehlin, and Emile Martin, write, says M. Faucher, pompous letters to the *Moniteur Industriel*, offering to receive unlimited orders from railway companies for wheels; but on account of the scarcity of iron, these very gentlemen are behind hand in their supplies to the Northern Railway, to the extent of *materiel* for 300 waggons. In fact, every branch of industry suffers directly or indirectly from the scarcity of iron; and as M. Faucher smartly observes, "the ironmasters take from us 400 francs per ton for iron, but only give us half rations, as in the time of famine."

It appears that the ironmasters have been terribly frightened by M. L. Faucher's letters—of all which the *Mining Journal* has now received a summary. They have written long and fierce epistles to the *Siecle*, in reply thereto; but the editor of that journal has refused to insert them. He however, says that the ironmasters may apply to the tribunals to compel him to do so, if they please; and he adds, that their monopoly is so profitable, that they can afford to spend a little money in law. I hope to heaven they will prosecute the *Siecle*, for the prosecution will be sure to make public the extent of the monopoly, which only needs to be clearly known to the people to excite universal indignation.

St. Dizier letters, of the 20th, state that the *fontes blanches* (referred to in the last quotations) were not for Gray (as stated in the *Mining Journal* last week), but for St. Dizier. The bargain was for 1,000,000 kilos. It was followed by another for 400,000 kilos, at 195 fr., taken at the furnaces. On the 15th prices were—*fers battus à la houille*, 390 fr. and 400 fr., for Paris, 400 fr. and 410 fr. for the country; *fers laminés*, of St. Dizier furnaces, 400 fr.; some transactions took place at 410 fr. and 415 fr.; *fers laminés* of furnaces of the Haute Marne, 390 fr.; *fils de fer*, 6 fr. to 6 fr. 20c.; *fontes blanches*, delivered at St. Dizier, only a nominal course, at 195 fr. to 200 fr. At the fair at Chalons-sur-Saone, of the 18th Nov., the *fontes fines de Comté* (1st quality), were 240 fr.; *fontes blanches*, of the Haute Marne, *à l'air froid*, 210 fr.; ditto, *à l'air chaud*, 200 fr.; one lot, however, *à l'air froid*, went at 217½ fr.; *fers du Bourgogne et du fin de Comté*, 510 fr.; *fers martinets*, 620 fr.; *fers à la houille de Bologne*, 430 fr.; *fers essieux* ditto, 440 fr.; ditto, ditto de Rimancourt, 440 fr.; *fers cornières*, 460 fr. The Company du Chatillonais sold 300,000 kilos of *fers marchands au bois* at 410 fr.: the Terre Noire Company maintained its prices at 340 fr., delivered at Lyon. The *fers roches au bois* of the Haute Marne were without offerers; *fers marchands* were offered at 475 fr., and *fers martinets* at 560 fr.—*Paris, Tuesday.*

ZINC TRADE OF BELGIUM.—The produce of the ores of zinc, and the smelting and manufacture of the metal, is becoming one of the most important items of Belgian industry—developing the mineral riches of the state, and giving employment to a large amount of the population, particularly in the province of Liege. On the first attempts to carry out the successful manufacture of this metal, many difficulties were met with, considerable loss was sustained, and much enterprising perseverance required to render it prosperous: experience has, however, overcome those difficulties, and the manufacture is becoming one of considerable magnitude. The following are some of the details:—the Vieille Montagne is at present looked upon as the head of the zinc establishments in Belgium. In 1807, the Abbé Douay had granted to him the concession of the calamine mines of Moresnet, which supply the company, and he devoted himself to improvements in the make of zinc; at that period, the furnaces and crucibles were much smaller than at present, and the metal obtained was of very inferior quality. From the obstacles he had to contend with, and heavy expenses, the Abbé failed in 1815, and transferred the concession to the Chaulet Company, after expending about 76,000*l.*, and at last even paying his men, by disposing of a rare collection of gold and silver medals. The new company having become established with nine furnaces, began to produce from 140 lbs. to 160 lbs. of zinc per day of a much better quality. Other companies started; and, in 1831, 5000 tons of washed calamine were produced. The Vieille Montagne was established in 1835—and so great was the increase that, in 1840, 18,000 tons of ore were extracted. The factories of Angleur and Moresnet were contructed in 1836, and have now 36 furnaces at St. Leonard's, 20 at Angleur, and 20 at Moresnet—being capable of turning out 5000 tons of zinc per annum. The most productive veins are found along the borders of the river Meuse; they consist of silicates and carbonates, in a matrix of white clay and hydroxide of iron. The factory of Malliere belongs to the Nouvelle Montagne Company, having 65 furnaces, capable of producing 4000 tons per annum—the Namur and Liege Railway runs through the property of this company; they have also erected eight furnaces at Prayon, with a flatting mill. The cost of raising the ore is 4s. 2d. per ton at Moresnet, worked open cast, and from 5s. to 5s. 10d. at Engis, from levels underground.

WARLICH'S PATENT FUEL.—We have, on two or three former occasions, called the attention of the public to the new fuel manufactured under a patent granted to Mr. Warlich, and which is now being worked by the "Patent Fuel Company." From numerous testimonals which we have seen, as well as from the official reports of trials, ordered by the Lords of the Admiralty, the superiority of this fuel over coal is thoroughly established, and is now adopted to a very great extent by the steam-packets of the various navigation companies, as well as those of her Majesty's navy. In its consumption on board ship, there is a saving effected of 25 per cent. in shipping—there being no dust, and consequent waste, thus 100 tons from this country will give 100 tons in the East Indies—30 per cent. in stowage, and about 20 per cent. in actual consumption, as compared with the best steam coal. These are acknowledged and well-known facts; and it is, therefore, but justice to state, that the fuel consumed by the Diamond Steam-Packet Company is not that of the Patent Fuel Company. At a meeting of the shareholders of the former company, a short time since, it was stated, that "patent fuel" cost 7s. or 8s. per trip more than Welsh coal, and to which the non-declaration of a dividend was generally attributed; but as Mr. Parkin, a director, did not state "whose" fuel was employed on board the "Diamond" Company's boats, it very naturally goes before the public as a sweeping assertion against all artificial steam fuel, and one which certainly cannot be applied with truth to Warlich's; the latter is decidedly superior in evaporative powers, economy of stowage and consumption, its superior cleanliness, and absence of danger from spontaneous combustion, to every description of coal. This fuel is used and highly appreciated by her Majesty's yachts; and has for some time past, and is now being sent out by the Lords of the Admiralty to various stations in the East Indies and the coast of Africa; and the *Avon* steamer, lately returned from a surveying expedition in the latter country, has reported most favourably of the use of Warlich's patent fuel, which she took out, and which had been attended with the above advantages in an eminent degree. We can, with every confidence, state the preference given by the Board of Admiralty to this fuel—having, in addition to other documents, this week seen an order from them for a very large quantity, to be delivered immediately. Mr. Warlich has obtained another patent, for converting this fuel into a pure and ponderous coke, free from sulphur, and of high evaporative power, which we shall notice on a future occasion.

RAILWAYS AND OTHER PUBLIC WORKS.—A Parliamentary return has just been issued, moved for by Mr. William Gibson Craig, giving a detailed account of the estimate of cost, the capital stock, and the amounts authorised to be borrowed, according to the various Acts, of all the railways and other public works sanctioned by Parliament in the last session. For railways, the total estimated cost of the construction of all the lines so sanctioned is 90,789,274*l.*—while the capital stock is 78,382,390*l.*; and the sums authorised to be borrowed amount to 30,597,595*l.* For navigation and canals the estimated cost of construction is 297,950*l.*; the capital stock, 170,000*l.*; and the sums authorised to be borrowed, 166,600*l.* For ferries and docks, the estimated cost is 2,996,683*l.*; the capital stock is 1,590,000*l.*; and the sums authorised to be borrowed, 1,913,000*l.* For piers and harbours, the estimated cost is 263,031*l.*; the capital stock, 174,000*l.*; and the sums authorised to be borrowed, 86,266*l.* For bridges the estimated cost is 130,000*l.*, and the sums authorised to be borrowed are 60,000*l.* For roads the estimated cost is 13,400*l.*; and for miscellaneous the estimated cost is 186,358*l.*; the capital stock, 270,000*l.*; and the sums authorised to be borrowed amount to 140,000*l.* The capital stock, and the sums authorised by all these Acts, to be borrowed for public works during the last session, may be thus shortly stated:—

Railways—Stock	£78,382,390
To borrow	30,997,595
Navigation and Canals—Stock	170,000
To borrow	166,000
Ferries and Docks Stock	1,590,000
To borrow	1,913,000
Piers and Harbours—Stock	174,000
To borrow	86,266
Bridges—Stock	130,000
To borrow	60,000
Roads—Stock	13,140
Miscellaneous—Stock	270,000
To borrow	140,000
Total authorised to be raised as stock, and to be borrowed	£113,692,991

A large failure is understood to have taken place in the iron-market of Glasgow. The liabilities of the party, chiefly arising from speculative transactions, are said to amount to nearly 100,000*l.*—*Times.*

Proceedings of Public Companies.

MEETINGS DURING THE ENSUING WEEK.

THIS DAY ....Oxford and Worcester Extension and Chester Junction Railway—Mason's Hall Tavern, at Three.
South Wheal Trelawney Mining Company—offices.
MONDAY.....Grand Junction Canal—Crown and Anchor Tavern, at Twelve.
Meavy Consols Mining Company—Tavistock, at Four.
Wheal Roborough Mining Company—Tavistock, at Three.
Hungerford Market Company—offices, at One.
TUESDAY.....Wheal Bucketts Mining Company—at the mine.
St. Cleer Consols Mining Company—at the mine.
Caradon Consols Mining Company—at the mine.
Northern and Southern Connecting Railway—London Tavern, at One.
WEDNESDAY...Regent's Canal Company—offices, at One.
Harrowbarrow Old Mine Company—Plymouth, at Twelve.
THURSDAY ....Mines Royal Company—offices, at Twelve.
Waterloo Bridge Company—Crown and Anchor, at One.
FRIDAY .....Great Western Railway—Paddington Station, at One.
SATURDAY.....West Wheal Maria Mining Company—Bedford Hotel, Tavistock, Eleven.
Wheal Elizabeth Mining Company—Tavistock, at One.

[*The meetings of Mining Companies are inserted among the Mining Intelligence.*]

BRISTOL AND POOLE HARBOUR RAILWAY.

A meeeting of the promotors of this undertaking was held, at the White Lion Hotel, Broad-street, Bristol, on Wednesday last,—Mr. Alderman POUNTNEY in the chair. The CHAIRMAN, in opening the proceedings, said the meeting had been called for the purpose of giving information in reference to the proposed formation of a line of railway between Bristol and Poole. At present there was no communication between the port of Bristol and the south of England, except by a tedious navigation round the Land's-end, or by means of slow stage waggons. The former mode was unusually tardy and expensive; and, if some more expeditious mode of transit were provided, the dealer might have the advantage of being able to dispose of his goods, and turn his money three or four times over. It is now an axiom universally admitted, that time is money; and as time thrown away was money thrown away, it became of importance to provide a good means of communication. The waggon communication was just as objectionable—the waggons were unloaded at Stallbridge, halfway between Poole and Bristol, and oftentimes goods remained for weeks before they reached their place of destination. At present all the railways from the west of England ran to London, as if that were the only place worthy of consideration. The proposed line would cross them all, running from north to south, while they ran from east to west. It would derive all the advantages arising from communication with those lines; while, as it would not run parallel for more than a few miles with any other line, it could not be regarded as competing with any. The line would also open a communication between the north and south of England; but Bristol had nothing to fear from that. The chairman next referred to the pre-eminence of Bristol for the manufacture of crystallised sugars, black bottles, and flint-glass—and said, if by opening readier communication with other parts of the kingdom they increased the demand for their manufactures, they would have fresh manufactories established in their city, and, as a consequence, increased employment given to its population. He then alluded to the importance of the projected line as a means of enabling the Somerset coal-fields to supply the south of England, the Channel Islands, and the coast of France. At present those places had to get their coal from a great distance, and at great expense. The county of Dorset must also derive very great benefit from the formation of such a line. At present the farmers had but small markets for their stock, grain, and cheese, or else were compelled to send to distant markets, such as Salisbury, or Warminster, at a heavy expense. The formation of a line of railway would place them in easy communication with the large markets of England, while it would enable them to get back artificial manures, and other articles of agricultural consumption. The landowners along the proposed line had been applied to, and with one exception were, he was happy to state, favourable to it. The line had been most carefully surveyed, and the traffic, as well from goods as from passengers, must be great.—Resolutions were passed approving of the line, and pledging the meeting to support it.

BANKING IN INDIA.

The state of the banking system in India is a subject which at all periods, and especially at present, calls for close attention in this country. Considerable interest will, therefore, attach to the following particulars, which have now been drawn up for the first time:—

It appears that the gross capital employed in banking operations in India is 9,452,903*l.*, and that upwards of 4,000,000*l.* belongs to the chartered banks of Bengal, Bombay, and Madras, which are established under the sanction of the court of directors of the East India Company, with the approbation of the board of commissioners for the affairs of India. The aggregate paid-up capital of these establishments, including the last half-year's profits, is 2,006,141*l.*; and their deposits and circulation, 2,281,946*l.* Of these sums, 1,708,436*l.* is retained in bullion, or invested in the Government securities; and the remainder—viz., 2,579, 651*l.*—employed as advances in loans and discounting bills at the chief town of each presidency. As the banks are prohibited from dealing in foreign exchanges, their operations are necessarily confined to the possessions of the East India Company.

The other 10 are joint stock banks, established on the same principle as similar institutions in England; and their aggregate paid-up capital, including profits and reserved funds, is 3,539,727*l.*; and their deposits and other liabilities, 1,625,089*l.*—making together a banking capital of 5,164,816*l.*; of which sum 682,398*l.* is retained in cash and Government securities; and the remainder—viz., 4,482,418*l.*—employed in advances on various descriptions of securities, discounting bills, and in carrying on exchange operations with India, China, and England, under the management of directors elected by the shareholders.

PATENT FUEL COMPANY—(WARLICH'S PATENT).

TO THE EDITOR OF THE MINING JOURNAL.

SIR,—I noticed in the *West Kent Guardian*, of the 14th inst., a report of the meeting of the Diamond Steam-Packet Company (and which I fear may have been copied into your and other newspapers), in which it is stated by a Mr. Parkin (a director of that company) "that patent fuel costs 7s. or 8s. per trip more than the Welsh coal;" and at that meeting the reason for the non-declaration of a dividend for the past year, was generally attributed to the loss incurred by the use of patent fuel.

I am now instructed to inform you, that the patent fuel alluded to in that report, is that of "Wylam's Steam Fuel Company," and which is totally different to this company's patent fuel, which is so much approved of on board her Majesty's yachts and navy, and the Peninsular and Oriental Steam Navigation Company, &c. &c.—As the publication of the statement alluded to, and which does not specify whose fuel it was, may be injurious to this company. I will thank you to insert this letter in your next publication.

I am, Sir, your obedient servant, W. N. DE MATTOS, Sec.

Patent Fuel Company (Warlich's Patent), 15, St. Mary Axe, London, Nov. 24,

PROFESSOR SCHONBEIN'S GUN COTTON.

TO THE EDITOR OF THE MINING JOURNAL.

SIR,—The time is near when the interest arising from scientific investigation, or the curiosity of the public, will be drawn to the practical utility of this substance; and as the legal representative of Dr. Schönbein in England, I feel called upon to direct the public aright, respecting the source whence it will be legitimately issued. Dr. Schönbein was urged to secure for his family the benefits which might result from his discovery; and it was suggested to him, that this would be most effectually obtained by inducing some leading house in the powder trade to undertake the manufacture of it, conjointly with gunpowder—so that, wherein it should win a preference through its powers and properties, it might be recommended, and, at the same time, yield precedence to powder, in cases where it might prove inferior in utility. With this design, it was resolved to challenge the scrutiny, and approval, or rejection, of some powder firm of long standing and known reputation for extensive operations, not only for the purposes of the public generally, and of foreign countries, but as also partaking largely in contracts with Government for powder. It was to the Messrs. Hall, of Lombard-street, and Faversham, Kent, that the matter was offered; and with an openness to conviction that did them credit, they agreed to enter on the examination of this formidable antagonist to their own object of produce. The powers and applicability of this new substance, tried before them in every way they could devise to test it severely, resulted in their acknowledging it a projectile power, greatly superior to gunpowder, and in their coming to arrangements with Dr. Schönbein for the manufacture of it under the patents he had secured. It remains only, therefore, to say, that in order to carry out this agreement, I am empowered to state (for Dr. Schönbein), that extensive arrangements are being rapidly matured for the manufacture of the cotton by this firm; and, in order to meet the very proper objections—"that the substance may be mistaken for unprepared cotton"—it has been determined, in compliance with Dr. Schönbein's suggestion, that it should be issued to the public in a dyed state; variety in the colours will serve to indicate the different uses for which it will be intended. I am, Sir,

THE LEGAL REPRESENTATIVE OF PROFESSOR SCHÖNBEIN.

NEW ATMOSPHERIC RAILWAY IN FRANCE.—M. Gautier (the inventor of a new system of atmospheric railways) has proposed the project of establishing an atmospheric line, so as to unite Paris with the delightful and much-frequented villages of Passy, Auteuil, and Boulogne. The trip is to be made in 10 minutes, and the charge for each passenger 4d. from Paris to Boulogne. The length of the line will be 11 kilometres; and, according to the estimate of the inventor and projector, the outlay will be 4,000,000 fr., or 160,000*l.* He also proposes to establish a tugging line on the same principle, should the above be accepted, which will draw up the barges from St. Cloud to the port or quay of St. Nicholas, in Paris, a desideratum which has long been wanting for the navigation of the Seine, and the cost will not exceed the former.

Original Correspondence.

THE GASES OF THE BLAST FURNACE.

SIR,—I must once more request that "Ferreus" will himself be accurate, before he charges me with error. Earthy matter, introduced into the blast-furnace, is comprised usually in the three substances commonly known as lime, clay, and sand. Now, referring to my original statement, 31 lbs. of aluminum combine with 28·2 of oxygen, to form 59·2 lbs. of the earth called clay; 74 lbs. of calcium combine with 28·8 lbs. of oxygen, to form 102·8 lbs. of lime; and 89 lbs. of silicon combine with 95 lbs. of oxygen, to form 184 lbs. of earth called sand. Again, 102·8 lbs. of lime combine with 57 of oxygen, and 22 of carbon, to form 182 lbs. nearly of the earthy matter called limestone. Hence, the bases of aluminum, silicon, and calcium, in the respective quantities of 31 lbs., 89 lbs., and 74 lbs., produce, when combined with their respective doses of oxygen, an amount of earthy matter equal to the sum of 59·2 + 184 + 182 = 426 lbs. nearly,—or deducting 22 lbs. of carbon, combined with the limestone, there remains a total of 404 lbs. of clay, sand, and lime, which, with 285 lbs. of peroxide of iron, make up the whole working burden to 689 lbs.; and the earthy matter is to the iron as 404 to 200—*i. e.*, as 2 to 1, or 66 to 33, nearly.

Had "Ferreus" taken the pains to assign to the 194 lbs. of earthy bases, their proper combining amount of oxygen, so as to produce what is commonly called the earthy part of the burden, composed of clay, sand, and lime, he would not again have exposed himself to the imputation of captious and superficial criticism.

Next, I nowhere stated, that the experiment was continued for a week; and, therefore, although the furnace *might*, during the period of observation, have been making *at the rate* of 50 or 56 tons per week, it does not follow that it continued to do so: in fact, it did not. Again, 25 tons of air consumed is the supposed average, per ton of iron, in the Welsh furnaces; and by no means applies to Darkhill, where, from the great infusibility of the materials, it is probable that 30 tons of air may be required to effect the reduction of one ton of iron.

I am obliged to "Ferreus" for his apt illustration of "back-water;" the narrow stream of blast from the hearth, impinging with great velocity on entering the wide channel of the boshes, and causing the gases from the upper regions of the furnace to descend along the sides of the boshes. I have not proved the passing off of the free oxygen at the furnace top; but I cannot imagine by what other outlet it may make its escape. Whatever quantity of oxygen enters a blast furnace, beyond that which can be taken up by the materials, must go off somewhere; and whatever quantity of salt, or sugar, or any other matter, we may mix with water, beyond the point of saturation, must either sink to the bottom, or swim on to the top, according as its specific gravity is greater or lesser than that of water. I never said anything about their being a good sale for my cement, which is a gratuitous assumption upon the part of "Ferreus." I imagine that a man may make good cement, or paint beautiful pictures, without *selling* either. As "Ferreus" is a classic, he will, perhaps, understand χαλκεος better than "Ahenεus."—ROBT. MUSHET: *Coleford, Nov.* 24.

CENTRAL HEAT.

SIR,—The wide field of the earth's surface having been long before as well as since the days of Whiston, a common chase, through whose wilderness philosophers may hunt at pleasure the *fera naturæ* of the imagination, without the danger of subjecting themselves to any law—I cannot have the least objection to Mr. Mushet's following the usual theory of the stratification of rocks; and proving it, as it is usually proved, by reference to what we know nothing about—a process going forward at the bottom of the sea. That great and lofty continents have been elevated, and corresponding portions possibly depressed, we admit, in order to account for certain geological appearances—we do not know what else to say about them; but we must stop here, and not suffer ourselves to be hurried away into the notion, that this thing is constantly going forward.

The whole observations of geology go to prove a state of *succession*,—and I no more believe that there is a coal field forming in the ocean from sea-weed and drift timber, than that a carboniferous stratum will be founded by the London smoke in the declivities of Highgate-hill. It is the weakness of limited men to explain by what they see, what never has been seen. We must stretch our faculties to much loftier conceptions—we must imagine the earth something enormous—double, perhaps, its present diameter—much less consistent, fuming with inward heat, teeming with hot fog and prolific vapour, surrounding a mass which has gradually solidified and concentrated its bulk, either by the loss of heat, or the act of gravitation to its centre. In some such state of its transition—from, perhaps, a mere nebulous mass, 10,000 times its present volume—we may imagine the elements of coal fields to have found their stately growth. How these elements have attained their present shape, we barely can conjecture. Why are the formations so merely local? If once continuous, where are the disrupted fragments? Were it not for the impracticable fact of vegetable evidences within them, I might conceive the whole mass to have been merely stratified by electric currents from some homogeneous slime. The uniform position of certain earths confirms this supposition. Indeed, it is most probable the whole body of the earth has been solidified from gaseous elements. We know water, or its elements, in three separate states—the gaseous, the fluid, the concrete: metals which are our densest bodies we know, likewise, in the three states—the gaseous, the fluid, the concrete; and we are, therefore, bound to believe the whole globe is but a concretion, gathered from all space, perhaps, by an electric current, which we name gravity, to a common centre. Thus, hydrogen, which we call a light body—and of which probably the upper region of our atmosphere is formed—is only, in that ascent, gathering to the negative pole; while oxygen solidifying in the masses of the earth, obeys the positive law. Is it improbable that, when "the Spirit of God moved on the face of the waters," the mass of water was immensely greater than it is now, covering, to a great depth, the whole surface of creation? that decomposed between these poles the hydrogen flew upwards "above the firmament,"—while the oxygen, becoming solidified with the metallic bases (whatever these may be), "the dry land appeared." The revolution of the earth around its axis produces, perhaps, our own electric currents. The onward motion which causes that revolution, and carries us in our orbit, is probably the repellant or the attractive act of some more distant electric pole. F.

Nov. 23.

FAUVELLE'S BORING APPARATUS.

SIR,—On the first public description of Fauvelle's new method of boring by hollow rods, through which the strata displaced is washed up by currents of water, I fully expected to hear that numerous landowners would have availed themselves of the so-stated cheap, expeditious, and certain method of searching for minerals; and that we should have seen, ere this, accounts of the results of numerous experiments. I am, however, surprised to find, that the subject appears to be almost lost sight of; and I should be obliged if you, or any of your correspondents, could inform me where I can hear of the patentee, whether there is any company formed for carrying out the objects of the patent, and whether they, or the patentee individually, or any other party, is prepared to undertake any description of boring work with the new apparatus. NEW RED.

Macclesfield, Nov. 24.

THE POTATO DISEASE.

SIR,—To all your readers who are eaters, I presume any fact connected with the potato, under its present disease, will be acceptable. My object is, to throw out what seems to me to obtain, as far as I have had an opportunity of ocular inspection, in order that others in different, but similar, localities to myself, may either corroborate or contradict it. It seems to me that, under the smoke of calcining houses, engines, and factories, throwing out their various gases, that are more or less injurious to all soils, as they are arsenical, or otherwise poisonous, the potato has best survived the recent attacks. May it not be, that such gas may neutralise the deleterious effluvia of the air; or, supposing the devourer to be an insect, that the air, partially poisoned by such gases, may kill it, to the preservation of the potato? The first place I can point at is central to the numerous stacks of Tincroft and East Crofty Mines; again, nearest the burning-houses of St. Agnes Consols, and the mine stacks; and as well in the valley below Gwennap, by the different furnaces for the burning of pyrites, in the production of arsenic and acids.

Should the disease reappear, I have made up my mind to treat a few rows with a smoking—from different mixtures being drawn along between in vessels, from which the fumes might evolve among the leaves. Perhaps your correspondent, Dr. Murray, whose field it more particularly is, would kindly assist in prescribing the ingredients to produce them on a large and cheap scale—such as nitrous and sulphurous gases, sulphuretted hydrogen, carbonic acid, and chlorine: carbonic acid, being produced, would lie by its weight along the ground among the stems a long time: therefore sea sand, or other carbonate of lime, being treated with sulphuric acid, in place between the rows, might prove a rescue to the crop. —JOHN PHILLIPS: *Pool, Illogan, Cornwall, Nov.* 13.

FUEL FOR RAILWAYS.

SIR,—Would you oblige me by answering the following questions:—Are *coals* used for the locomotives on *railways* in England, or "*a composition?*"—and in what proportions? Is this composition patented?—and whose patent is *best?* Is it applicable to the general purposes of steam navigation, &c.? Can a copy of the patent be obtained?—and at what expense? Is this composition used by Government?—and to what extent?

London, Nov. 26. A CONSTANT READER.

[We believe *coals* are very rarely employed in locomotive engines—*coke* is the usual fuel; but we are aware manufactured fuel has occasionally been used. We have, on various occasions, noticed the specifications of patents for fuels for furnaces, and which, in general, are peculiarly suited for steam-boat purposes. We have noticed Corke's, Wylam's, Stirling's, Warlich's, and others, but we are not in a position to say whose is best; the latter we know is patronised by the Lords of the Admiralty, and some observations will be found in another column, founded on an inspection of official documents. The specifications may be obtained at the Patent-office, where the expense can be ascertained.]

IMPROVEMENTS IN SCIENCE—RAILWAY CONSTRUCTION.

SIR,—It is a fact well worthy the attention of the physiologist, that the human mind closes itself against the admission of any new idea, which may chance to be at variance with the impressions by which it is preoccupied; and although the truth is clear, and palpable as noon-day, and presents itself in ever so simple and convincing a form, yet, with a pertinacity the most tenacious, does the mind of man cling to its favourite perceptions—thus defying all attempts, of either argument or persuasion, to make the slightest change in its sentiments. Whether it be selfishness, or an obtuseness of comprehension, I am unable to determine—but much fear that the former infirmity is most at fault in the matter; because we generally see a succeeding age ready to adopt, and take advantage of, the idea which was scouted as an absurdity by the one contemporary with the invention or discovery. This, I fear, is a malady inherent in the human system; for we have seen it operating in all ages, and at all times. In the pages of sacred history, its baneful effects are unceasingly calling down the vengeance of an offended Creator, to punish the stubborn and contumacious self-will of the dependant creature; and we might go on tracing its effects in every age, until we arrive at the present—when we will find that the 19th century, A.D., is quite as prone to be influenced by the failing, as was the first century, A.M.

When Harvey first discovered the circulation of the blood, it has become a matter of history how difficult he found it to gain even common attention from the medical men of the day, who sneered at, and scouted as the vain imaginings of a disordered brain, that splendid discovery of a master mind, which was so beautifully and precisely in accordance with the laws of Nature; and it was scarcely in the life-time of the discoverer that any credence was given, to what, should any one now presume to doubt the truth of, he would be voted insane by general consent—so truly have succeeding generations done justice to the sublime discovery, which the jealousies of contemporaries would have crushed as an absurdity. The same fate awaited Jenner, when he discovered the virtues of vaccination, which has proved to be the greatest boon ever conferred on the human race, by one of our fellow mortals,—and which, had it occurred before the introduction of Christianity, would certainly have led to the deification of the discoverer; and yet it is well known how difficult he found it to gain the attention of the profession—waiting, in fact, more than seven years of his existence, before he was able to have it introduced. Next, we come nearer to our own times: Watt took the whole time allowed for his patent—14 years—and did not get remunerated for his splendid discoveries connected with the steam-engine; and it is a fact well known, that the first person who proposed transmitting gas by pipes through the streets, for the purpose of illumination, found it impossible to convince, or even to gain the attention of the public—although, at a very great expense, he lighted one of the streets at the West-end for a considerable time; still in the face of this "damning" proof, did the scientific men of the day declare it an *impossibility*, and even the "solons" of the Society of Arts refused to give credence to their own senses, and, in spite of undeniable ocular demonstration, did the members of this society refuse to entertain the idea, so repugnant to their self-love—the fact being, that not one of them could forgive the inventor for being beforehand with them in the discovery,—nor had they the straight-forward manliness to assist him in testing the feasibility of his ideas, but with heartless indifference allowed him to struggle on alone, unsupported and unsympathised with, until his crushed and broken spirit sunk beneath the cold apathy of an unfeeling world, when, goaded to desperation, he put an untimely end to his existence. How different from this would we have expected such a society to act—they hold out to the world that they are ready to encourage and assist in the development of inventions, and improvements, which may conduce to the advancement of either the comfort or convenience of mankind—but with all their professions, I fear that the infirmity I have alluded to has too great an ascendancy in their councils to allow them to accord their assistance and influence with that impartiality which ought always to attend the deliberations of such a body.

I daresay, Mr. Editor, you are wondering what all this moralising will tend to; but I will relieve you by shortly explaining, that I was led into this train of thought, on reading the letter of Mr. C. H. Greenhow, to the editor of the *Times*, which appeared in that paper on Thursday last: the correctness of what he stated there, in accounting for the accident at Fampoux, was so self-evident and convincing, that I was quite startled to think, that it had not suggested itself to the scientific men, who had evidently been consulted by the authorities at Lille; but when I came to consider what slight attention Mr. Greenhow had obtained to the same exposition of the inadequacy of the present system of railway construction, which he has been laying before the British public for several months, I found I must look deeper for the cause of the apathy displayed,—and the reflections contained in this letter are the result of my search: I was more confirmed in my opinion, on looking through the *Mining Journal*, and seeing the reception Mr. Greenhow met with at the Society of Arts, and recalling to mind the different letters which have appeared on this subject.

Southampton, Nov. 24. Q. E. D.

METROPOLITAN IRON AND STEEL COMPANY—DR. MURRAY.

SIR,—The following expressions, in the advertisement of the Metropolitan Iron and Steel Company, excite my risibility—though rather of a taciturn temperament—"a company has been formed for the manufacture of iron and steel (from cast, scrap, and *all descriptions of old refuse iron*) which *shall* be of a *superior quality to any other hitherto produced* in the *mining districts*." The *ne plus ultra* of malleable iron!! The standard of strength and toughness!!—equally applicable for the balance springs of watches, or the ponderous shafts of steam-ships. All this to be done in London—the seat of "the collective wisdom." This is a bold assertion, easier made than proved. When emanating from parties apparently desirous of promoting the benefit of others, its basis ought to be that of truth. It is well known to ironmakers in general that an heterogeneous assemblage of old frying-pans, hoops, coal scoops, and rat-traps, *do not* make *good iron*, nor to a profit, if a cent. per cent. waste is to take place, independent of the general commixture of pure and impure, overheated and burned scraps, of different qualities of iron, that is to form the rude jumble of this Cockney project—to say nothing of the extra expense of coal and other incidents, which must be brought from a distance. I think no man who places a proper value on his *l. s. d.*, will ever give his money away to such a visionary scheme. If the ironmakers "in the mining districts" cannot make a superior malleable iron, without the dictum and example of the Metropolitan preceptor, it matters not how soon they are sent to the use of the puddle and rabble. The account in the *Mining Journal* of last week, given by your Newcastle correspondent, of the superiority of hot-blast iron over cold-blast iron, will not have that powerful effect he anticipates. From the several discussions which you have published in the *Mining Journal*, for the two or three years past, on the strength of hot and cold-blast iron; the several experiments that were made thereon were *variable*—some in favour of hot-blast iron, and some on cold-blast iron—depending, in a great measure, upon the materials of the locality; so is the effect of the *quantity* of the material used: some places saving from 6 to 8 tons of coal; in others, none. This observation must be taken into account, before such conclusions can be sufficiently supported.

I did not like the illiberal and ungentlemanly attack of "W. Gillot, surgeon, Haymarket," on the character and judgment of the worthy and talented Dr. Murray, in the *Mining Journal* of the 14th inst. There was, in the whole of that letter, a want of that fine sensibility that distinguishes, or should distinguish, the man of learning. I have always looked up to the writings of Dr. Murray, in your Journal, with respect; he appears unostentatious, candid, concise, and instructive, for which it appears they are generally given; his remarks are voluntary and valuable. My opinion is, should that gentleman withdraw his contributions from the *Mining Journal*, they would leave a hiatus that would not be readily filled up.

Cramlington, Salop, Nov. 25. FERRUM.

IMPROVEMENTS IN SHIPBUILDING—THE WAVE LINE.

SIR,—It was not my intention to have noticed the letter of "R. S. N.," which appeared in the *Mechanics' Magazine*, of Saturday, the 14th inst., because the arguments he uses do not at all bear on the question—the point in dispute being, how much of the displaced water will impinge on the line drawn from the stem to the broadest part of a vessel; not as to what quantity will be displaced by the advance of the vessel a certain distance. My figure went to show that, in progressing a distance equal to C, E, the quantity of the displaced fluid, which would impinge on the line C, B, would just be one-half of the quantity impinging on the line C, G; and, consequently, the cohesion and friction would be greater on the longer line, in a ratio, as expressed by the two triangles. However, I have been induced to change my intention, on account of a friend suggesting that, although the arguments used by "R. S. N." do not bear on the point in question, yet they are sufficiently plausible to take the attention of the general reader, unless shown to be incorrect by an exposition of their discrepancies; I shall, therefore, though reluctantly, be obliged to request you to allow space in your valuable columns for the very few remarks I think it necessary to make, in order to dissipate the illusion, with which "R. S. N." is exhilarating himself. Referring to his letter, I must again repeat what I stated in my last reply to a letter of his, that I do not doubt his assertion, that he "cannot make out" what is meant by the demonstration he complains of—because he has taken too much pains to prove the absolute obtuseness of his ideas, to leave any uncertainty about the clearness of his comprehension. What he says about "adhesion being caused entirely by friction," is really too ridiculous—it would be well if "R. S. N." could digest his confused ideas, before he again commits them to paper. The figure he has favoured us with does not at all bear on the question in dispute—the point at issue being as to the quantity of water in *contact* (at one and the same time) with the surface before the broadest part of the vessel, not having the remotest connection with the quantity of water to be *displaced*. The figure, which I will presume your readers have before them, merely goes to support a proposition laid down by me in one of my letters to the *Mining Journal*, to the following effect:—"That, in traversing a distance equal to her length, a vessel displaces a quantity of water equal to her weight;" therefore, parallelograms, such as those drawn by "R. S. N.," will be a correct measure of the quantity of water displaced by the vessel advancing a distance equal to the base—and that quantity of water will have the same ratio to the weight of the vessel, that the base of the parallelogram has to the length of the vessel; but the problem, to the solution of which we wish to arrive, is not at all affected by the above facts.

What we wish to come at is, how to make this transposition between the vessel and the water before it, in the easiest and most expeditious manner; and as entirely different laws are called into operation before the broadest part, from those that are operating abaft that part, it becomes necessary to consider them separately—and, after having done so, then to sum up the whole evidence, and decide accordingly. After what I have now stated, it will be superfluous to point out the error "R. S. N." has fallen into, when he says the hypothenuse is less than the other two sides of the triangle—this truism no one will go about to dispute; but it will beat the philosophy of either him, or any one else, to prove that the same quantity of water is in contact with the line C, B, in the parallelogram C, E, H, B, as is in contact with the line C, G, in the parallelogram C, E, B, G—the fact still becoming more apparent, that, as the angle at E is diminished, the line C, G, must be lengthened in a precisely similar ratio, and the proportion of the water (contained in the parallelogram), which is in contact with the bow, increased in an exact ratio with this increase of length—thus this very figure, brought forward by "R.S.N." (inserted in last week's *Mining Journal*), confirms all that I have previously asserted, and would have answered nearly as well as my previous demonstration by triangles—my reason for adopting which was, that on account of the accumulation of the water along the line C, B, before it is dispersed beyond the side of the vessel, the pressure, or resistance, increases towards the point B, and the triangular figure expresses the value of that increase. I am curious to know the dimensions of the *Columbus*, and trust that "R. S. N." will keep his word, and let us have the information promised. With best thanks for the space allowed, for what, I fear, you will consider my too long letter, I remain, &c.—NAUTICUS: *London, November* 24.

IMPROVEMENTS IN SHIPBUILDING.

SIR,—Your correspondent, "Nauticus," has been unfortunate in the selection of the performance of the sharp-bowed steamer, the *Encounter*, on beating the full-bowed brig, the *Mariner*, three days, in the voyage from Pembroke to Plymouth; it may afford some evidence respecting the flat and rising floors, but it refutes the deductions arrived at in favour of full bows, from the twice-repeated diagrams. In your correspondent's letter, the resistances of a ship in her course are divided into three classes:—1, removal of water; 2, friction; 3, adhesion. The two last-mentioned are of very minor importance in comparison with the first. Now, instead of the mass of water removed being as the weight of the vessel (the original assertion, I apprehend), it is measured by the area of the midship section, and by the space of motion; and, as the same mass must be moved by a given area of midship section passing over equal spaces, the resistances must be lessened, as the violence of contact is reduced by sharper bow angles. The assumption, that a larger mass of water is removed proportional to the increased length of the bow with a sharper angle, is an error of fact, not of theory. In the letter of the 18th November, a midship area of 1 ft. square is given, equal to 1 at one mile per hour: increase the speed to five miles per hour, and the resistance will be increased to 25, or 5 × 5 (termed mathematically the square of the velocities). Now, this statement, as it stands, is correct, since the absolute pressure on the square foot of water removed in equal spaces, at five times the velocity, increases in that ratio. The subsequent reasoning is erroneous—viz.: "because, at five times the velocity, not only is the pressure on the square foot referred to five times as great; but also, in going over five times the space, five times the quantity of the water has to be thrown aside."

Now, the facts are for equal spaces, passed over by a square foot of midship area, the water resistance during one-fifth of the time, at five times the velocity, is 25 times as great; but as five times the space is passed over in equal times, the total effect of the resistances is 25 × 5, or 125; and hence, to overcome it, a power, equal to the cubes of the velocities, is requisite. The theory of shipbuilding is not of that simple character as to be founded on a few diagrams—these are of value, if confined to distinct questions; but injurious, if used to confound and bother mixed questions. S. S.

Penryn, November 22.

P.S.—Sharp bows are commonly an improvement, if they are an addition to a vessel; but often an injury, in case they are a substraction from the requisite displacement. In comparison of rival claims, the same displacement should be referred to, both of sharp and full bows. As an instance of addition, the lengthening of one of the Isle of Wight pilot boats 6 feet by the bow, may be mentioned. This vessel was increased from about 40 to 46 feet in length, the mast was shifted about 18 inches forward, and the only increase of canvas was one more cloth in the foresail. The result was in bad weather, especially on a wind, an increase of more than one-third in the speed. She would beat to windward fast in weather, in which she was obliged to lay to previously: under such circumstances, more spray was thrown in abaft the mast, but the vessel was much drier forward—a bad boat was thus converted into a good boat.—S. S.

EFFECTS OF THE STORM ON THE DUBLIN AND KINGSTOWN AND DROGHEDA LINES.—So great (says the Irish journals) was the flood, and such was its violence at high-water on Friday, at about noon, that the train which left Dublin for Kingstown, at 12 o'clock, had to put back, not being able to proceed beyond Booterstown. The tide rushed in over the boundary wall of the line at a point between Merrion and Booterstown. Even if the carriages could proceed, there was imminent danger of the up and down trains crossing each other. In order to prevent the fearful consequences of such an accident, the trains did not ply either way, until the tide ebbed sufficiently, which it did in about an hour and a-half. Telegraphic signals were in active operation along the entire line during the morning. The utmost precaution was caused by the officers of the company to prevent accident.—The Drogheda line was exposed in many parts to the violence of the wind and sea, but it escaped unhurt, and the usual trains passed back and forward during the day, without the least interruption.

CHURCH'S PATENT COKE.

In the *Mining Journal* of Saturday last, we briefly noticed a new method of manufacturing coke, and now proceed to a more full explanation with an engraving of the oven employed. Fig. 1 is an elevation of the front, with half left out, to show the interior—A being the door, and B B the

Fig. 1.

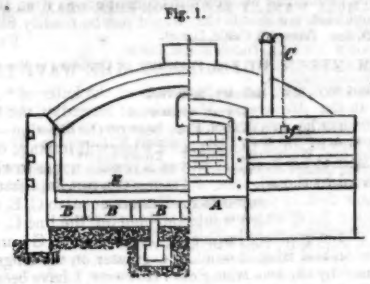


Fig. 2.

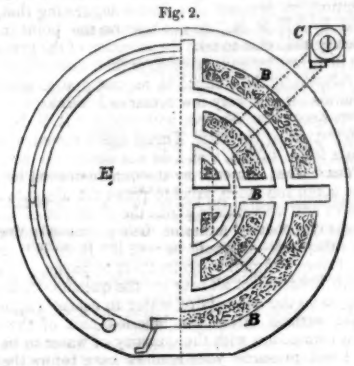
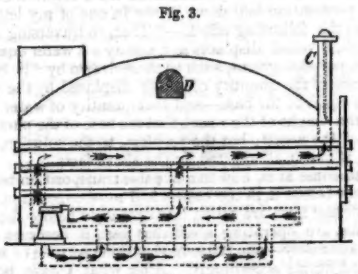


Fig. 3.



circular and cross air passages,—and corresponding with the same letters in fig. 2: these passages communicate one with the other, and with two vertical pipes, C, closed on the top with a valve, which is opened when the cooling process is going on, but have no connection with the interior of the oven: D (fig. 3) is the chimney flue. The mode of operation is as follows:—A quantity of coal is thrown in, sufficient to cover the floor, E, of the oven, to the depth of 2 ft., and spread so as to incline a little downwards from the sides, towards the centre. As the oven is charged, a temporary wall is built at A, up to the door: a shovel full of burning coals is then thrown in,—and when the fire is well burned up, the door is closed, and well luted up: in this door are a number of oblong apertures, which can be opened or shut by sliding covers, so as to regulate the quantity of air admitted: the passages which admit the air necessary for combustion are now left open, while those for cooling, B B, are closed. As the carbonisation advances, those passages or flues are gradually closed; and at the conclusion of the burning, of which the cessation of all flame may be taken as a good practical criterion, they are wholly shut; the valves on the top of the vertical pipes, C, are then opened at top—as are also the apertures leading to the air chambers B B—and the coke is left to cool before removal; the drawing the coke while hot, and quenching it with water, is thus avoided—and that produced by this new mode of manufacture is of a very superior quality, while the amount produced from a given quantity of coal is much larger than usual. The time usually employed in coking 8 tons of coals, and cooling, varies from 80 to 90 hours, according to the quality of the coal employed, and the temperature of the atmosphere. When a coke is required more than usually free from sulphur, and other metallic admixtures, the patentee passes a current of electricity through the ignited coal in the following manner:—As soon as the flame on the surface begins to die away, the apertures in the door are closed by the slides before mentioned—as also all those for the admission of air to the coke: an iron rod is then introduced into the coke near the bottom of the front of the oven D, and another on the surface of the coke at the back of the oven—the former rod is then connected with the positive pole of a powerful galvanic battery, and the latter with the negative pole, by means of stout copper wires, leaving the body of coke in the oven to complete the circuit; 6 tons of coke should remain subject to the electric apparatus for about two hours. On analysing specimens of coke from the same coal, one of which had been subject to electricity, and the other not, the former is found more free from sulphur and metallic mixture, than the other, by about 12 to 1. The patentee's claims are for regulating the admission of air to the coke—cooling the coke within the ovens, without exposure to the air—the application of electricity, for the purpose of freeing the coke from sulphur and other admixture—and the construction of coke ovens, as here described.

LONDON THAMES AQUEDUCT.—The supply of water to the metropolis, taken up as it is from situations in the River Thames by the water companies at present in existence, where it is polluted by every description of filth from the common sewers, has long been subject of loud complaint; and, notwithstanding its impurities have been proved to exist, before committees of the House of Commons, and as such most detrimental to the public health, nothing has yet been done to remedy the evil. We are glad to observe, that application is to be made to Parliament in the next session, for an Act to incorporate a company for better supplying the metropolis with water. It is proposed to take the water from the Thames at a place called Bray-lock, in the parish of Taplow, Buckinghamshire—and convey it from thence by aqueducts and culverts to a reservoir near the Swiss Tavern, St. John's Wood, in the parish of Hampstead, from whence it will be supplied by pipes to the inhabitants in the usual way. At this distance up the river, the waters of the Thames may be considered to be in their utmost purity—equal, perhaps, for domestic use, to any water in the kingdom; and, should the Act be obtained, it will be a great boon to the inhabitants to introduce a wholesome fluid into their dwellings—form, it is to be hoped, a competitive check on the present congregated monopoly—and would, doubtless, turn out a profitable undertaking to the shareholders.

NEW OMNIBUS MODEL.—A model of the new omnibus, intended to be used by the Economic Conveyance Company in Liverpool, has been shown to us. The body of the carriage is divided into three compartments, having separate entrances. The centre carriage is lower than the end ones, and is intended for passengers paying twopence a mile. The compartments in front and behind are raised somewhat higher, for the purpose of placing the wheels under the body, so that the ladies dresses will not be soiled by entering or leaving the vehicle. But the most ingenious part of the invention lies in the wheels. There are eight, four under the fore carriage and four under the hinder one; the whole of which are connected by bars from the axles, which give a uniform motion to the whole, no wheel being capable of moving without giving a corresponding motion to the other seven. Two horses will generally be used, but when the line of route is hilly, three horses will be attached abreast, as in Paris. Each station in town will be a mile; and should the passenger wish to ride farther, other omnibuses will run in conjunction; so that the traveller can proceed in another conveyance, either in the same line, or at a tangent, as his business requires.—*Liverpool Courier.*

THE INTERNAL HEAT OF THE EARTH.

As the subject of central heat has lately formed the subject of discussion among several of our correspondents, we have thought that the opinions of HUMBOLDT—a man who has paid, during an active life of upwards of half a century, such particular attention to natural phenomena, both celestial and terrestrial—would be read with interest; and probably correct the views of some who may have formed too hasty conclusions on the subject: we shall now, therefore, give from his excellent work *Cosmos*, which we noticed in the *Mining Journal* of the 24th ult., a few detached extracts, connecting them without departing from the language of the author. He considers the compression of the earth as a consequence of the centrifugal force acting on a rotating mass in a semifluid state, and as evidencing an earlier condition of fluidity in this planet; in the course of solidification an enormous quantity of latent heat would have been disengaged; and supposing, with Fourier, the process of consolidation to have commenced by radiation into space from the cooling surface, the particles nearer to the earth's centre would have remained fluid and incandescent. After long transmission of heat from the centre towards the surface, a stable condition of temperature would have been established, when the heat would increase uninterruptedly with increasing depth. The high temperature of water which rises in very deep Artesian wells; direct observations of the temperature of rocks in mines; and above all, the volcanic activity of the earth, ejecting molten masses from opened clefts and fissures—bear unquestionable evidence to this increase for very considerable depths in the upper terrestrial strata. That which is most difficult for us to conceive, is the boundary line between the fluid interior mass and the solidified rocks forming the outer crust; or the gradual change from the solid state to that of semi-fluidity. It seems highly probable that the action of the sun and moon, which produces the ebb and flow of the ocean, is also felt in these subterranean depths. Tolerably accordant experience has shown, that in Artesian wells the average increase of temperature in the strata is 1° of Fahrenheit for every 54½ feet of depth; or, if we suppose this increase to continue in an arithmetical ratio, a stratum of granite would be in a state of fusion at a depth of about 21 geographical miles—or between four and five times the elevation of the highest summit of the Himalaya mountains. He considers there are three causes of the propagation of heat—viz: 1, periodical, causing the temperature to vary according to the position of the sun and the period of the year, when the warmth penetrates downwards or escapes upwards; 2, part of the heat which has entered the earth's crust in the equatorial regions, travels along the interior to the vicinity of the poles—an operation extremely slow; and 3, the loss of central heat radiating to the circumference, and there escaping; but this cooling of the globe, and addition to the heat of the strata, is so slow as to be hardly appreciable by any instruments. There are at different portions of the earth's surface different depths, where the temperature is invariable: in our temperate latitudes the stratum of this invariable temperature is from 59 to 64 feet; while in tropical climates this point is only 1 foot below the surface. The unchanged length of day and night is shown by him to indicate the almost stationary temperature of the earth; for as, from the unaltered time of vibration of a pendulum, we are enabled to conclude that the equality of its temperature has been maintained, so the unchanged velocity of the earth's rotation furnishes a proof of the stability of its mean temperature. The velocity of the earth's rotation depends on her volume; and since, from the gradual cooling of the mass from the effects of radiation, the axis of rotation would become shorter, any such decrease of temperature would be accompanied by increased velocity of rotation and diminished length of day. Now, comparing the secular inequalities in the moon's motion with eclipses observed by the ancients, shows that, since the time of Hipparchus, or during an interval of 2000 years, the length of the day has not been diminished one-hundredth part of a second: it is known, therefore, that the mean temperature of the earth has not altered during that period so much as one three-hundredth part of a degree of Fahrenheit. In his consideration of the causes of action of volcanoes, he shows that the hottest permanent springs yet known, are those discovered by him, and at a distance from any volcano—the "Aquas Calientes de las Trincheras," near Porto Cabello, in South America, 194·5° Fahrenheit, issuing from granite—"Aquas de Coman Gillas," near Guanaxuato, 205·5° Fahr.; and the sources of these springs he estimates at 7800 English feet: these springs, not far from the boiling point, are not so uniform in temperature as those of Europe, from 122° to 165° Fahr., which have undergone no perceptible change for the last 60 years. In 1759, when Jurillo was raised 1759 feet above the surrounding plain, two small springs, the Rio de Cutimba and the Rio de San Pedro, disappeared, and some time afterwards broke out again at a temperature of 186·4° Fahr. M. Arago also, in 1821, noticed that the deepest Artesian wells are the warmest, and threw a new and important light on the doctrine of thermal springs, and the law of the increase of terrestrial heat at increasing depths.

MANGANESE.—Beckmann, in his *History of Inventions and Discoveries*, expresses his surprise by what accident the peroxide of manganese could have been found out by artists to be useful in staining glass—it being a mineral, the outward appearance of which has nothing to recommend it. Certain it is, that manganese is of great use in freeing glass from its dirty colour, and in proper proportions stains it a beautiful light purple, something near the colour of amethyst. The *rationale* of its former property may be thus described: the silica used in the manufacture of glass often contains iron in the form of a protoxide, staining it green; when peroxide of manganese is added, it parts with some of its oxygen, becoming reduced to the protoxide, which remains colourless in the glass; the protoxide of iron, at the same time, absorbing the oxygen, consequently becomes converted into a peroxide, which is also colourless; and if more of the peroxide of manganese be added than the carbon, or the protoxide of iron, can reduce, the result is an amethyst colour. It is not improbable that the ancients employed manganese, if not for glazing, at least for painting, their pottery or earthenware, as soon as they became acquainted with its use at the glass-houses, and its susceptibility of being converted into a coloured vitreous mass. The use of manganese in rendering the glass colourless, has been retained through every age to the present time, and it is alluded to by all authors who have written on glass-making; its distinguishing characters are a resemblance to a burnt coal or cinder, and the fracture appears striped and coloured; it is found in many parts of Europe, and Germany for some centuries has supplied its own manganese to the glass-houses. Some salts of the lower oxides have lately been used as producing a brown colour in calico printing.

VESSEL WRECKED WITH SILVER-LEAD ORE.—During the storm of Saturday last, the 21st inst., about three o'clock in the morning, the *Devon* (Capt. Beer), with a rich cargo of silver-lead ores, the produce of East Tamar and the Holmbush previous sales, consigned to Mullins, Brothers, and Co., London, smelters, was driven over to the French coast, and became a wreck: crew saved, and the cargo insured at Lloyd's.

AINSLIE'S BRICK AND TILE MACHINE, AND DRYING AND BURNING KILN.—As long since as the 26th of Nov., 1842, we gave a description of Ainslie's tile-making apparatus, with a diagram, which we then noticed as a beautiful piece of mechanism, of the utmost regularity of motion, and producing tiles or bricks, of every required form, whether for drainage, roofing, or other purposes. Since that period, Mr. Ainslie has effected numerous improvements, by which the perfect working of the machine is much facilitated, particularly in an entirely novel method of self-feeding, with the tempered clay, instead of the common method, by a hopper placed over the rollers, and which was the plan adopted with some modifications in the first form of Mr. Ainslie's machine; the feeding is now effected by a cylinder, on the axis of the fly-wheel—behind which is a platform, forming an inclined plane, down which the clay falls towards the roller; by an arrangement inside this cylinder, a plate of iron is projected through a longitudinal opening in the circumference, just as it reaches the clay, and forces a portion of it through the moulds—thus keeping up a continuous stream of tiles or bricks, as the case may be, and the machine works much more easily. Another important improvement made by the patentee is, a new construction of kiln, for drying and burning bricks and tiles; it is composed of various compartments, by which the heat from the first passes into the second, from thence into a third, and so on—thus economising the heat; and, when the tiles in the first are burnt, the second are half-burnt, to which the greatest heat is then applied, and the chambers are taken in succession—the thorough drying of the bricks being completed by using the heat after it has completed the burning. This new apparatus has been proved on a large scale; and, unlike the common method, by which, frequently, one-quarter of the article is spoiled, in this, every brick and tile is found to be as perfect in shape as it entered, and thoroughly burned. We understand that the company do not intend charging royalty in future, but to sell the machines at a reduced price, to place them within the reach of small farmers and others.

SALT MONOPOLY IN FRANCE, SPAIN, AND INDIA.

The monopoly over the manufacture of salt, maintained by the Government in FRANCE, which increases the price to the consumer 200 per cent., has for several years caused a general outcry among all classes of the community, who consider it one of the most prejudicial that an industrious people can be oppressed with. Numerous petitions, session after session, have been presented to the Chamber, by free-trade Peers and Deputies, emanating from the leading interests of the kingdom; notwithstanding which, and the many promises made by Government, that a modification of these duties should take place, no reduction is yet made; and it would appear that they cannot bear to give up the revenue arising from this impost, although most injurious to every branch of industry. The greatest sufferers are, perhaps, the curers of fish—the Newfoundland fishery has, of late years, been a source of profitable enterprise to French industry, but is sadly cramped by this monopoly; and the Chamber of Commerce has addressed a memorial to the Ministers of Commerce and Finance, with the object of obtaining permission to use foreign salt during the season of 1847; the object being to employ salt from the ports of Portugal, which can be obtained for 10s. 5d. per ton; while, in France, it costs 40s. At present no notice has been taken of this memorial; but the Minister of Marine has announced, as usual, that he should be ready to receive contracts for 200,000 tons of salt, to be delivered at the port of Brest. Salt is annually getting more and more scarce in France, and the greatest exertions are required to keep up a supply equal to the demand, even at the present exorbitant prices. Some rumours are afloat, of the probability that the tax will be greatly reduced in the next session, and the import duty on British and Belgic salt repealed—the Minister of Commerce wishing to show some signs of attention to petitions so respectably and numerously signed.

SPAIN also has severely suffered, and still suffers, from the royal monopoly of the manufacture of salt: through it a considerable portion of the fish of the Atlantic and Mediterranean is entirely lost, which, in a Catholic country such as Spain, would add amazingly to the national food; and, surrounded as she is with prolific fishing grounds, she is actually obliged to resort to England and Newfoundland for salted codfish—an indispensable article for the fast days of the people. The following extract will convey a clear idea of the effect of this impolitic tax:—"The salt works (says Townsend, who wrote about 80 years ago) yield a considerable revenue. These were formerly considered as private property; but in the year 1348 they were taken by Alonzo II., and in 1564 Phillip II. seized them as part of his demesne. The chief of them are in Andalusia, Valencia, Catalonia, and Majorca. The salt works of Matra, in the kingdom of Valencia, would easily furnish 1,500,000 of fanegas, of about 100 lbs. weight, which, could they find a market, would, at 22 reals the fanega, make 330,000*l.* sterling per annum; but, by raising the price, they have lessened the demand, so that the whole amount of the kingdom is only about two-thirds of what one work alone might furnish."

The effects of the tax on this necessary of life and health in INDIA we have, on numerous occasions, adverted to—it is totally indefensible even as revenue, because we have before shown that it brings to the company no revenue at all—all they gain is a positive loss; while the population of 40,000,000 of people are taxed 1200 per cent. on the first cost of the article—the majority of whom are deprived of a sufficient quantity of this health-preserving and savoury condiment. The salt of Warwickshire contains only 12 parts of impurities to 988 parts of pure muriate of soda; the common salt of Cheshire, only 16½ parts; and rock salt, 16¾ parts of impurities, out of 1000—while that manufactured in India, from the muddy shores, is black, filthy, and disgusting, and would not be recognised as salt by an Englishman, on its being first placed before him. The contiguity to the sea of our salt mines, enables our merchants to compete with any salt-producing country in supplying this article to any spot on the habitable globe. Our present exports are 11,000,000 bushels annually, employing shipping to the amount of 290,000 tons of dead weight; and, if the duty on salt in India were only reduced to a more moderate sum, this amount would most probably be doubled. The United States of America manufacture a large quantity of excellent salt annually; and formerly, there was an impost on the admission of British salt of 400 per cent. As the population, however, increased, the production of salt did not increase with it; and too wise to debar the nation of what they could not supply themselves, the tax has been so reduced, that 4,000,000 bushels are annually imported into America from this country. We trust the time is not far distant when the advance of free-trade principles will have found their way to the purlieus of Leadenhall-street, and when so extensive a population of one of the most fertile and prolific countries on the globe will be emancipated from a tax—one of the relics of barbarous misrule—and which prevents the development of the bounties with which Nature has surrounded the inhabitants of India, and the employment of thousands upon thousands of tons of British shipping. We understand that no fewer than nine memorials have been forwarded to the Indian authorities against the salt monopoly—they emanate from commercial bodies in Chester, Worcester, Blackburn, Manchester, and Liverpool.

ASTURIAN MINING COMPANY.—At a Special General

Meeting of the proprietors, convened by advertisement, and held at the offices of the company, No. 9, Austinfriars, on Monday, the 23d November, 1846,

GIDEON COLQUHOUN, Esq., in the chair,

The advertisement convening the meeting (as inserted in the *Mining Journal* of the 14th inst.), having been read—the directors' report, with the correspondence from the superintendent, and the balance-sheet, having also been read—it was

Resolved unanimously,—That the report and accounts, now read, be received, adopted, and entered on the minutes.

Resolved unanimously,—That, from the cheering prospects which the company presents, the unappropriated shares be reserved for the future decision of the shareholders; and that the directors be empowered to raise such further capital as may be required, between the present time and the period of holding the annual meeting in June next, by calls, not exceeding £2 per share—such calls being divided into two equal instalments.

Resolved unanimously,—That all shares upon which the arrears of calls now due, be not paid on or before the 30th inst., shall be declared forfeited.

Resolved unanimously,—That the directors be empowered to renew the negotiation with Mr. Busenthall, should the opportunity present itself, on the terms previously agreed upon, or to enter into a similar arrangement with any other competent party, with the view of effecting the object contemplated.

Resolved unanimously,—That the thanks of the shareholders are due, and are hereby given, to the chairman and the board of directors, for the zeal and attention manifested by them in conducting the affairs of the company; and that this meeting do express their full confidence in the success of the undertaking, and the prospects of benefit held out by the highly satisfactory report submitted. K. MACKENZIE, Secretary.

9, Austinfriars, Nov. 23, 1846.

ASTURIAN MINING COMPANY.—Notice is hereby given,

that, in terms of a resolution of the special general meeting of the shareholders in this company, held at their offices this day, the remainder of the SHARES on which CALLS PAST DUE shall not be paid on or before the 30th day of November inst., will be CANCELLED, and new shares issued in lieu of them, for the benefit of the company.

By order of the board,

9, Austinfriars, Nov. 23, 1846. K. MACKENZIE, Secretary.

LA JAHOTTIERE IRON COMPANY.—At a Special General

Meeting of the proprietors, held pursuant to advertisement and circular, on Thursday, the 26th inst., at their offices, No. 22, Throgmorton-street, City,

BENJAMIN IFILL, Esq., in the chair.

The advertisement convening the meeting, as also the provisions under which such was called, having been read—it was

Resolved unanimously,—That, in conformity with the 15th Article of the Acte de Société, the capital social of the society be increased by the issue of new shares, so as to constitute the entire capital of the society of the sum of 1,000,000 frs.

Resolved unanimously,—That the *gerants* of the company be authorised to take such measures as will duly and legally carry this resolution into effect.

Resolved unanimously,—That the shares to be issued, in conformity with this resolution, shall, at the option of the subscribers, be of the denomination of 1000 frs., 500 frs., or 250 frs. each; and that the holders of the present shares may exchange the present shares, of the denomination of 1000 frs., into shares of 500 frs. or 250 frs. each, upon notice to the *gerants*, and upon delivering up their shares to be cancelled.

Resolved unanimously,—That, at all future meetings of the society, the holders of 20 shares, of 250 frs., or 10 shares of 500 frs. each, and so on, in the proportion of interest as provided by the 15th Article of the Acte de Société, shall have the same right of voting as accorded to the holders of five shares of 1000 frs.

Resolved unanimously,—That the cordial thanks of the proprietors be given to T. L. Murray, Esq., and Mr. Duprez, for the services rendered the company by them in carrying out its operations, and bringing it into its present productive state; and also expressive of the confidence they entertain in their future services, being calculated to advance the interests of the company, and to promote its general objects.

BENJAMIN IFILL, Chairman.

It was moved, seconded, and carried unanimously,—

That the thanks of the meeting be given to B. Ifill, Esq., the chairman, for the interest manifested by him in advancing the prospects of the company, and for his services in the chair this day.

22, Throgmorton-street, Nov. 26, 1846.

BIRMINGHAM AND OXFORD JUNCTION RAILWAY,

AND BIRMINGHAM, WOLVERHAMPTON, AND DUDLEY RAILWAY.—Notice is hereby given, that the SEALED CERTIFICATES of these companies will be ISSUED in EXCHANGE for the RECEIPTS for SCRIP, on and after the 14th Dec. next.

THOMAS HOLROYD, Secretary,
Birmingham and Oxford Junction Railway Company.
JOHN WILLIAM KIRSHAW, Secretary,
Birmingham, Wolverhampton, and Dudley Railway Company.

34, Bennett's-hill, Birmingham, Nov. 24, 1846.

BIRMINGHAM, WOLVERHAMPTON, AND DUDLEY

RAILWAY.—CONTRACT FOR WORKS.—Notice is hereby given, that the directors of this company will meet at their offices, 34, Bennett's Hill, Birmingham, on Monday, the 14th Dec., 1846, at Twelve o'clock in the day, for the purpose of RECEIVING TENDERS for the construction of the following works:—

GREAT BRIDGE CONTRACT—from Vyse-street, Birmingham, to Great Bridge, being a distance of about six miles.

Drawings and specifications of the line may be seen from the 16th Nov. to the 1st Dec. (inclusive), at No. 102, Constitution-hill, Birmingham; and from the 2d Dec. to the 12th Dec. (inclusive), at No. 17, Great George-street, Westminster.

The necessary forms of tender may be obtained at those places during the above-named periods.

Tenders are to be delivered at the offices of the company on or before the 14th Dec., not later than Twelve o'clock in the day, when and where persons tendering are requested to be in attendance.

The directors do not pledge themselves to accept the lowest tender.

WILLIAM MATHEWS, Chairman,
JOHN WILLIAM KIRSHAW, Secretary.

34, Bennett's-hill, Birmingham, Oct. 29, 1846.

NOTE.—*Nov.* 16, 1846.—Contractors wishing to tender for the above contract, are requested to meet at No. 17, Great George-street, Westminster, on the 23d inst., at Two o'clock P.M., for the purpose of appointing a surveyor to take out the quantities in the usual way; and also to receive lithograph copies of the plan, sections, and specifications.

CALEDONIAN RAILWAY—SIXTH INSTALMENT—

£50 SHARES.—Notice is hereby given, that the directors of the Caledonian Railway Company have made a CALL for a SIXTH INSTALMENT of FIVE POUNDS per share, on the £50 shares, PAYABLE on or before the 18th day of December next, at any of the under-mentioned banks:—

LONDON—Messrs. Masterman, Peters, Mildred, Masterman, and Co.'s, 35, Nicholas-lane, Lombard-street.
LIVERPOOL—Messrs. Moss and Co.'s.
MANCHESTER—Sir Benjamin Heywood, Bart., and Co.'s.
BRISTOL—The National Provincial Bank of England.
NEWCASTLE-ON-TYNE—The Newcastle Commercial Banking Company.
EDINBURGH and GLASGOW—The Commercial Bank of Scotland, and the Edinburgh and Glasgow Bank.

Interest, at the rate of 5 per cent. per annum, is charged on all calls paid after the day fixed.—Transfers of shares received at this office after Tuesday, the 24th inst., cannot be registered till the call is paid. By order of the board,

J. BUTLER WILLIAMS, Secretary.

Office, 122, Princes-street, Edinburgh, Nov. 20, 1846.

CALEDONIAN RAILWAY—CLYDESDALE JUNCTION

GUARANTEED SHARES.—Notice is hereby given, that the directors of the Caledonian Railway Company have made a CALL for a FIFTH INSTALMENT of FIVE POUNDS per share on the Caledonian Railway (Clydesdale Junction Guaranteed Shares), PAYABLE on or before the 15th day of Dec. next, at any of the under-mentioned banks:

LONDON—Messrs. Masterman, Peters, Mildred, Masterman, and Co.'s, 35, Nicholas-lane, Lombard-street.
LIVERPOOL—Messrs. Moss and Co.'s.
MANCHESTER—Sir B. Heywood, Bart., and Co.'s.
NEWCASTLE-ON-TYNE—The Newcastle Commercial Banking Company.
BRISTOL—The National Provincial Bank of England.
EDINBURGH and GLASGOW—The Commercial Bank of Scotland, and the Edinburgh and Glasgow Bank.

Interest, at the rate of 5 per cent. per annum, will be charged on all calls paid after the date fixed.—Transfers of shares received at this office after this date, cannot be registered till the call is paid. By order of the board,

J. BUTLER WILLIAMS, Secretary.

Office, 122, Princes-street, Edinburgh, Nov. 20, 1846.

CORNWALL RAILWAY.—Notice is hereby given, that, in

pursuance of the provisions of the Act of Incorporation, the FIRST GENERAL MEETING of proprietors in this undertaking will be HELD in the Assembly Rooms, at Truro, on Wednesday, the 16th December next, at noon.—Those proprietors only who have been previously registered can attend and vote at the meeting.

JOSEPH THOMAS TREFFRY, Chairman.
WILLIAM H. BOND, Secretary.

Cornwall Railway Office, 80, Lemon-street, Truro, Nov. 21, 1846.

The sealed certificates will be issued immediately after the above-mentioned meeting has been held.

SLIGO SHIP CANAL COMPANY.—Notice is hereby given,

that an EXTRAORDINARY GENERAL MEETING of the company will be HELD at their offices, at Winchester House, Old Broad-street, London, on Wednesday, the 9th day of December next, at Twelve o'clock P.M., for the purpose of considering the expediency of selling and transferring the Sligo Ship Canal undertaking, under the powers contained in the company's Act of Incorporation, to the Sligo and Shannon Railway Company; and, if deemed expedient, for deciding and fixing upon the terms of such sale and transfer. By order of the directors, A. GOLE, Secretary.

Dated this 17th day of Nov., 1846.

SLIGO AND SHANNON RAILWAY COMPANY.—Notice

is hereby given, that an EXTRAORDINARY GENERAL MEETING of the company will be HELD at their offices, at Winchester House, Old Broad-street, London, on Wednesday, the 9th day of December next, at One o'clock P.M., for the purpose of considering the expediency of purchasing the Sligo Ship Canal undertaking, and to authorise the directors to create such an additional number of shares, and to borrow such sum of money as may be necessary for completing such purchase, and in case it shall be deemed expedient to make such purchase for confirming the terms thereof.

By order of the directors, A. GOLE, Secretary.

Dated this 17th day of Nov., 1846.

TO CONTRACTORS.—GRANTON, near EDINBURGH.—

The plans and specifications for a proposed STONE BREAKWATER, at GRANTON, may be seen by intending contractors, at the engineer's office there, after the 30th Nov. current.—Tenders, sealed, addressed to John Gibson, Jun., Esq., W.S., 12, Charlotte-street, Edinburgh, and indorsed "Breakwater Tender," to be delivered at Mr. Gibson's chambers, on or before the 31st December next.

The Duke of Buccleuch reserves right to accept any tender, though not the lowest.

Edinburgh, Nov. 20, 1846.

ALBION PLATE GLASS COMPANY.—The ENTIRE

REMISSION of the DUTY on PLATE GLASS has created a demand for that article far beyond the present power of supply. The vicinity of London affords great and peculiar advantages in this manufacture; and several valuable improvements (some of which will be patented) are yet to be developed. To carry out these, in a judicious and comprehensive manner by practical men, who have effected many of the greatest improvements during the last 20 years, this COMPANY HAS BEEN FORMED, under most respectable and scientific auspices; and it will, by manufacturing a superior article, at *reduced cost*, undoubtedly, ensure to itself a large and profitable portion of this important and vastly increasing branch of trade.

A considerable amount of the capital is already subscribed, and the remaining part of the investment will be apportioned to *bonâ fide* and responsible parties only—giving a preference to the respectable members of the trade and large buyers.

Apply to the secretary pro tem., at the offices of the company, No. 4, Railway-place, Fenchurch-street, where any further information may be obtained.

HENRY HOWARD, Secretary pro tem.

HOLBORN-HILL, SNOW-HILL, AND FARRINGDON-

STREET VIADUCT COMPANY.—(REGISTERED PROVISIONALLY.)

Capital £200,000, in 20,000 shares, of £10 each.—Deposit 11s. per share.

The allotment of shares will take place as early as practicable by the committee of management; and, in the meantime, all further applications for shares are to be made to the solicitors, Messrs. Carritt and Osgood, 5, Guildhall Chambers, Basinghall-street; and applicants are requested to confine their references as much as possible to bankers, brokers, or other parties within the city of London.

METROPOLITAN IRON AND STEEL COMPANY,

(Provisionally registered, pursuant to Act of Parliament, 7 and 8 Vic., c. 110.)

Capital £200,000, in 10,000 shares of £20 each.—Deposit £2 per share.

A company has been formed for the MANUFACTURE OF IRON AND STEEL (from cast, scrap, and all descriptions of old refuse iron), which shall be of a superior quality to any hitherto produced in the mining districts.—The objects of the company are fully explained in the prospectus.

In allotting the shares a preference will be given to parties in the iron trade.

Applications for shares and prospectuses to be made to Mr. Charles Chilton, No. 39, Moorgate-street; or at the Steam Mills, 135, Old-street.

NEWBRIDGE AND TAFF VALE COLLIERY,

GLAMORGANSHIRE.—2000 shares, at £10 each.

This valuable colliery is situate in the parish of Llanwonno, in the county of Glamorgan, in the centre of the South Wales Mineral Basin, contiguous to New Bridge, 12 miles from Cardiff; and the Taff Vale Railway, from Cardiff to Merthyr Tydvil, runs through the property—granted, by a lease of 360 acres, for the term of 31 years. The property is surrounded with profitable collieries—one of which (Mr. Coffin's) adjoins this, and supplies the Great Western Railway. Three veins are found to be throughout this property—the Gofilon Vein, 5 ft. thick—the Cummor Vein, 3½ ft. thick—and Coffin's Vein, 4 ft. thick. These veins—proved by the usual computation—will yield an aggregate quantity of *five millions tons*. This, by working 200 tons per day, from one pit only, at a profit of 2s. 6d. per ton, will yield a clear income of upwards of £7500 per annum; but, as this rate of produce will last considerably more than thrice the period of the lease, the colliery will be worked by more pits, and, consequently, yield a profit of at least £20,000 per annum, at a cost of, say, 6s. per ton, and sale 8s. 6d. per ton; but Mr. Coffin obtains considerably more per ton; and, therefore, it is but fair to suppose the present company will obtain the same; in which case, the profit will be upwards of £30,000 per annum. Even this large sum cannot be supposed to be too highly estimated, when it is recollected that the utmost cost is estimated at 6s. per ton, and the sale only at the moderate price of 8s. 6d. per ton—whereas all coal of the district is sold above the estimate, and that the Taff Vale Railway runs through the property—that the colliery is within 12 miles of the large shipping port of Cardiff—that the coal can be raised from the pit and directly placed on the railway waggons—and that the coal is known to be of superior quality for steam-engines, from the fact of its being used by the Great Western Railway. The colliery will be in full operation in about two years. For the first year the shareholders will receive a dividend of only 5 per cent. out of the first year's produce; but, as in the meantime, the Gofilon and Cummor veins will be reached, and be in gradual increase of produce—the second year's dividends will be large; and, therefore, there is every fair reason to say, this undertaking, not only carries the certainty of large profits, but presents fairer and more legitimate prospects of remuneration to the shareholders, than was ever presented to the public.

COST OF PRODUCTION AND CARRIAGE TO SHIPPING PORT.

Getting or Winning ..... *per ton*	1s 7d	Wear and Tear	0s 3d
Underground hauling	0 4	Railway Carriage to Port	1 1½
Dead Work	0 8	Shipping Expenses	0 6
Prop Wood	0 1	Divers extra expenses	0 3
Royalties	1 0	Agency and Incidental Charges	0 2½
Total			6s 0d

Sale, 8s. 6d.—Cost, 6s. 0d.—Profit, 2s. 6d. per ton.

Application for shares, to be made to Messrs. Roberts, Carter, and Co., mineral surveyors, 21, Portman-street, Portman-square, where the engineer's calculations may be seen in detail (also a plan of the property, and conditions obtained).

Prospectuses, &c., may be had at the office of the *Mining Journal*, 26, Fleet-st., London.

STEAM COAL—WITHOUT SMOKE, as per experiments

made at her Majesty's Dockyard, Woolwich.

CAMERON'S COALBROOK STEAM COAL, AND SWANSEA AND LOUGHOR RAILWAY COMPANY.—(Completely Registered and Incorporated.)

OFFICES—2, *MOORGATE-STREET, LONDON.*

The directors are now prepared to supply steam ship companies, manufacturers, shippers, and others, with the company's steam coal, either at the company's wharf at Swansea, or in London. A statement, showing by comparative trial the superiority of this coal for steam purposes over every other, and a scale of prices, may be had on application at the company's offices here, or at their wharf at Swansea.—March 18, 1846.

TO RAILWAY COMPANIES, COKE BURNERS, IRON FOUNDERS, &c.

CHURCH'S PATENTED IMPROVEMENTS IN THE

MANUFACTURE OF COKE, AND CONSTRUCTION OF COKING OVENS.—LICENSES TO USE THIS PATENT may now be obtained, on application to Messrs. Theobald and Church, Gas Works, Colchester, Essex.

IMPORTANT TO ENGINEERS, MANUFACTURERS,

RAILWAY AND STEAM-BOAT COMPANIES.

Messrs. W. & C. MATHER beg to call the attention of the ABOVE PARTIES to their

IMPROVED ELASTIC METALLIC PISTONS.

The PRINCIPAL FEATURE and ADVANTAGE of THIS IMPROVEMENT is—

1. Its great ELASTICITY and SELF-ADJUSTING PROPERTIES, which enable it to yield to any inaccuracy of the cylinder, whether oval or taper, and to move with the least possible friction.

2. Its extreme SIMPLICITY and LIGHTNESS, consisting of only two pieces of metal, having the vertical and lateral pressure in due and proper proportion, independent of each other.

3. It takes the LEAST possible SPACE, and is well adapted for air and water-pumps, as it allows of a larger water way.

Messrs. W. & C. MATHER feel confident that it is the BEST ELASTIC METALLIC PACKING yet known, for the above reasons.

Models may be seen at the Salford Iron-Works, Manchester; at W. Barker's, engineer, Newton-Moor; and also at J. Mather's, engineer, Beaufort-street, Chelsea, London.

TO ENGINEERS AND BOILER-MAKERS.

LAP-WELDED IRON TUBES FOR STEAM-BOILERS.

THE BIRMINGHAM PATENT IRON TUBE COMPANY,

42, *CAMBRIDGE-STREET, BIRMINGHAM, & SMETHWICK, STAFFORDSHIRE,* MANUFACTURE TUBES under an exclusive license from Mr. Richard Prosser, the patentee. These tubes are now very extensively used in the boilers of marine and locomotive steam-engines in England and on the continent—are stronger, lighter, cheaper, and more durable than brass or copper tubes, and warranted not to open in the weld. They may be fixed in the boilers without ferules, and can be taken out and refixed without additional trouble or expense.—Address, 42, Cambridge-street, Crescent, Birmingham.

LONDON WAREHOUSE,
68, *UPPER THAMES-STREET.*

TO ENGINEERS, BOILER-MAKERS, AND OTHERS.—

LAP-WELDED IRON TUBES, FOR STEAM-BOILERS.

W. H. RICHARDSON, JUN., & CO., DARLASTON,
STAFFORDSHIRE,

MANUFACTURE all DESCRIPTIONS of WELDED WROUGHT-IRON TUBES, for STEAM, GAS, &c., of any required length and diameter, on the new and unequalled principle of Mr. J. Roose's recent invention (patented August, 1846).—Address as above.

THE PROJECTED RAILWAYS.

PATENT METALLIC SAND OR ENGLISH POZZOLANO.

—The PROPRIETORS of the METALLIC SAND, after many years' experience of its merits, confidently RECOMMEND it to the attention of Engineers, Architects, Builders, and the public generally, as an invaluable article for HYDRAULIC and OTHER WORKS requiring great strength and durability.

In analysis, the metallic sand is very similar to the Italian Pozzolano—the value of which, in all subaqueous works, is so well known to engineers and architects; but from its granular form, and the sharpness of its angles, and the increased quantity of iron it contains, the metallic sand has been found more durable, and much cheaper than any other similar material at present in use.

From its chemical qualities it forms, in admixture with lime and common sand, a cement, mortar, or concrete, of flinty hardness, and almost entire incompressibility; and from its adhesive and impervious qualities, it completely and for ever excludes water. The more it is exposed to the atmosphere, and to wet and damp, the harder and more durable it becomes. In the formation of mortar and concrete, it has been extensively used in the great tunnels on the London and Birmingham Railway, in the foundations of the New Houses of Parliament, sea walls on the North Devon Railway, Clifton Reservoirs, and other works of importance.

As an external stucco, the metallic sand cement is unaffected by frost or wet; in appearance it resembles the best Portland stone; requires, therefore, neither colour nor paint, and is entirely free from vegetative cracks and blisters, to which Roman cement is liable.

Further information will be given, and specimens shown, on application to Mr. C. K. Dyer, 4, New Broad-street; and at the Metallic Cement Wharf, King's Road (opposite Pratt-street), Camden New Town, London.

ANALYSIS OF THE PATENT METALLIC SAND.

Silica	49	Lime	6
Oxide of Iron	32	Magnesia	2
Alumina	6	Zinc	3
Arsenic and carbonate of copper			2

PROSPECTUS OF THE

BRISTOL AND POOLE HARBOUR RAILWAY

COMPANY.

Capital £1,000,000, in 50,000 shares, of £20 each.—Deposit £2 2s. per share.

REGISTERED PROVISIONALLY.

PATRONS AND SUPPORTERS.

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JOHN SAMUEL WANLEY SAWBRIDGE ERLE DRAX, Esq., M.P., Charborough Park, Dorset.
J. WELD, Esq., Lulworth Castle, Dorset.
Colonel JOHN MICHEL, Dulish House, Dorset.
WILLIAM CARTWRIGHT, Esq., Proprietor of Collieries in Monmouthshire and Glamorganshire.
E. B. ASHFORD, Esq., Babcary, Somerset.

ACTING COMMITTEE.

HENRY STRETTON, Esq., Ramsgate, Chairman.

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John Gray Wilson, Esq., Westbourne Grove.	Russel-square.
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Sir James Caleb Anderson, Bart.	George Chisman, Esq., Dalston, Middlesex.

PROVISIONAL COMMITTEE.

(With power to add to their number.)

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Capt. T. C. Newton, Bruton-street, and Lugwarden, Herefordshire.
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Wm. C. O'Connell, Esq., Upper Seymour-street, Portman-square.

LONDON BANKERS.

London and County Bank; the London Joint-Stock Banking Company.

COUNTRY BANKERS.

Messrs. Stuckey and Co.; National Provincial Bank of England; Messrs. Ledgard and Co., Poole; Messrs. Bastard and Co., Blandford.

ENGINEER—George Rennie, Esq.

SECRETARIES (pro tem).—Messrs. Castleman and Kingdon.

SOLICITORS.

Gilbert Stephens, Esq., 13, Northumberland-street, Strand.
Messrs. Castleman and Kingdon, Winborne.

Since issuing the former prospectus, the committee being determined to proceed on the surest grounds, and anxious for the ultimate success of the undertaking, have made further and more minute inquiries into the remunerative traffic to be expected on this line; and they are warranted in stating, that the result of such inquiries has greatly exceeded the expectations upon which they grounded their former prospectus.

This line of railway, commencing at Bristol, will open a direct communication with Poole, passing through or near the important towns and villages of Whitchurch, Pensford, Clutton, Shepton Mallet, Bruton, Castle Cary, Wincanton, Stalbridge, Sturminster Newton, Shillingston, Stourpain, Blandford, Spittlebury, Sturminster Marshall, Wimborne Minster, to Poole Harbour; and thus, by means of the line of packets intended to be established by this company, from that port to the Channel Islands and Cherbourg, and the railways now in progress from the latter place to the French capital, and from thence to Lyons, will complete the line of communication by the most direct way from Edinburgh to the south of France; thus enabling that country to supply herself with many articles of commerce at little more than half the cost she at present pays, and leaving a good remunerative profit to the company and producer at home.

Among the various sources of traffic to be expected on this line, the following are the most prominent:—The supply of the Government with coal from the Welsh and Somersetshire pits, by means of the proposed line, for its different naval and steam depôts throughout the world. The Somerset pits, which are 36 in number, yield at present, about 2000 per diem, but are capable of yielding a much larger quantity; and, supposing that 2000 tons were carried by the railway, at 1d. per ton a mile, a distance of 40 miles for 300 days in the year, which is even less than the company have every reason to expect, it would yield a net return of £100,000, or 10 per cent. upon the estimated capital; deduct then 40 per cent. for working the line, wear and tear, and there remains the sum of £60,000, or 6 per cent. per annum on the capital. There can be no doubt of the demand of this important article of general consumption, from the great diminution of price to the consumer by the costs of carriage being reduced to 1d. per ton per mile from the present cost, which is from 6d. to 10d. The supply of the Channel Islands (population more than 100,000), and of France, with the best species of coal for the production of gas, as well as for the use of their manufactures and for domestic purposes. This article, by means of the various coal-pits situated on the line, will yield to the company a very fine remunerative profit, and be of the greatest benefit to the coal proprietor, as the coal necessary for the purposes of gas can be obtained in very large quantities, and delivered at Cherbourg at one-third less than they are now giving for the same coal, and which cannot, therefore, fail to be of equal benefit to the merchant abroad, the producer at home, and the proposed company. Besides these two great sources of coal traffic, there is the supply of the southern coast, and the different districts on the line, with coal for domestic use, at a saving of from 6s. to 7s. a ton. This is a circumstance that cannot fail to secure to the company the entire traffic, and be of the greatest benefit to themselves and the public in general. In addition to this, the line will afford to the great manufacturing city of Bristol a more ready market for all those articles of commerce of which France and the Channel Islands stand so much in need, and which are manufactured in great quantities at that city; and season as the line is completed, tenders will at once be submitted to Government for the more speedy transmission of the mails to the Channel Islands, by which a saving of more than 12 hours will be effected, and to the north and north-west of Great Britain a saving of 24 hours.

There is also very considerable traffic to be derived from the various stone quarries, iron mines, and clay pits, on the line (the clay pits yielding alone more than 50,000 tons annually); sand from the Isle of Wight, for the manufacture of glass, of which more than 10,000 tons annually are used in Birmingham alone; the present mercantile traffic which now goes round the Land's-end to the western ports; the great agricultural, manufacture, and passenger traffic from the rich and populous districts through which the line passes; and the traffic which must be thrown upon the line from the Welsh iron and coal-masters, as being the nearest and most direct outlet to the continent for the produce of that country. Independent of remuneration, this line ought to be looked upon as a great national undertaking and benefit—as it will do away with the necessity for vessels now employed in the Dutch, Danish, Swedish, and Russian trades, bound to the western parts of England, going round the Land's-end, by at once opening to them the harbour at Poole, which has been pronounced by eminent engineers to be one of the best natural harbours in the world, and capable, at a small expense, of being made accessible to vessels of the largest class with perfect safety, and enabling them to send their cargoes to their different destinations in less time, and at less expense, than at present; by this means, not only will the shipowner and the merchant be greatly benefitted, but the company will derive an immense annual revenue from the cargoes of northern produce thus landed at Poole, to be again distributed, by means of their railway, to the different manufacturing towns throughout this country; and the passenger traffic that would naturally follow so large a portion of mercantile traffic cannot fail to yield to the company a very handsome return upon their outlay.

The average number of vessels detained in this trade in going round the Land's-end amounts, from the most authentic sources, to about 4000, each vessel averaging a detention of five days. The average tonnage of these vessels amounts to 130 tons, which would give six men to each vessel, working after the rate of £60 per month, which would give, for the number of days detained, £10 to each vessel: this, multiplied by the number of vessels—viz. 4000—would give the sum of £40,000, which will be entirely saved by means of this line. This is independent of the loss of life, destruction of property, expense of insurance, and loss of time, which would all be saved by the projected rail—the statistics of which, did space allow, would make every one look upon the present undertaking, not only as one of great local importance, but one of great national benefit.

The advantages have long been known and appreciated, and the present company have determined to bring them into play in the most full and efficient manner. The expense of storage at Poole, as well as the port dues, are less than at any port in the kingdom; so that the merchant would be enabled to keep his goods there at a less expense than at his own port. He would be enabled to perform five voyages for every three from the northern parts; and, by means of the speedy communication by the electric telegraph, and the rapid travelling of the present day, many advantages and conveniences will be afforded.

A careful preliminary survey having been made by the company's surveyor, the line has been pronounced to present less than the average engineering difficulties, about 30 miles being through a rich, populous, and level valley. The harbour of Pool has also been surveyed, and the bar at the mouth of the harbour has been pronounced to be capable of removal, and is now actually being removed; thus opening to vessels of the largest tonnage one of the safest and most commodious harbours in the world.

These are a few of the advantages offered to the public by the projected line; and the committee, impressed with the sense of the excellence and legitimacy of the undertaking, and basing their views upon ascertained facts and undoubted evidence, feel themselves warranted in offering to all applicants for shares the following conditions—viz: That no party taking shares in the said company shall be liable (in case of failure of the company) to a larger amount than 5s. per share, unless a greater sum shall be sanctioned at a general meeting of the shareholders called for that purpose: so that, in case the company fail at any period of time prior to such meeting being called, the committee pledge themselves to return £1 17s. per share instead of £2 2s., and a proportionately larger amount if the accounts of the company, upon inspection, show a less expenditure.

At the first general meeting of the shareholders the committee will produce an account signed by the bankers, of the several sums received by them on account of the company—thereby warranting to the shareholders, that the amount subscribed is still in the hands of the bankers, minus the 5s. per share.

The future plans of the company will be laid before the shareholders at their first general meeting, and everything submitted to their investigation and approval.

To the Provisional Committee of the Bristol and Poole Harbour Railway Company.

I request you will allot me shares of £20 each, in the above undertaking, agreeably to the prospectus; and I agree to accept such shares as may be allotted me on the terms above mentioned, and also to pay the deposit thereon, and to sign the Parliamentary contract and subscribers' agreement, when required.—Dated the day of 1846.

Name.....
Residence.....
Trade or profession.....
Reference.....
Address of referee.....

*** Applications for shares may be made, in the above form, at the offices of the company, 55, King William-street, City; Gilbert Stephens, Esq., 13, Northumberland-street, Strand; Messrs. Castleman and Kingdom, solicitors, Wimborne; T. Hyatt, Esq., solicitor, Shepton Mallet; S. Smith, Esq., Blandford; M. K. Welch, Esq., solicitor, Poole; R. Bate, Esq., Bridgewater; Messrs. Drew and Charlton, sharebrokers, Manchester; Messrs. J. Smith and Co., stockbrokers, Edinburgh; Messrs. Stanley and Wasborough, solicitors, Bristol; Messrs. Bradley and Barnard, stockbrokers, Bristol; Messrs. Hill and Williams, solicitors, Farrington Gurney; J. McGeorge, Esq., 110, St. Vincent-street, Glasgow; Messrs. Lane and Perry, stockbrokers, Birmingham; Messrs. Thompson and Co., stockbrokers, Derby; and Messrs. Jones and Co., Dame-street, Dublin.

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